



A Level III Cultural Resources Evaluation of Powertech (USA) Incorporated's  
Proposed Dewey-Burdock Uranium Project Locality within the Southern  
Black Hills, Custer and Fall River Counties, South Dakota

## 5.7.2 Artifact and Feature Inventory

Artifacts recorded at site 39CU463 consist of a biface fragment, two scrapers, two retouched/utilized flakes, two utilized cobbles, and twelve pieces of flaking debris. Raw materials include chert, chalcedony, and quartzite (Table 5.11). No cultural features were observed.

Table 5.11. Artifacts Observed at Site 39CU463.

Number	Artifact Type	Material	Colors	Comments
2	Primary flake	Chert	Brown, red mottled	
2	Secondary flake	Chalcedony	Light gray	One retouched
1	Secondary flake	Chert	Yellowish brown	
1	Secondary flake	Unknown	Unknown	Utilized
1	Secondary flake	Chalcedony	Brown	
1	Secondary flake	Quartzite	Pinkish gray	
2	Tertiary flake	Chert	Gray-purple, yellowish brown	
1	Tertiary flake	Unknown	Unknown	
1	Flake	Chert	Pebble	
1	Biface fragment	Quartzite	Purple	
1	Scraper	Quartzite	Brown	
1	Scraper	Chert	Light gray	
1	Shatter	Chert	Purple	
1	Shatter	Quartzite	Brown	
1	Utilized pebble	Unknown	Unknown	
1	Tested cobble	Unknown	Yellowish brown	

## 5.7.3 Interpretation and Recommendations

Site 39CU463 is a very sparse and eroded scatter of Native American lithic debris. The NRHP eligibility status of site 39CU463 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The site is eroded with no potential for substantial, intact buried cultural material or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU463 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.



## 5.8 SITE 39CU464

**Site Number:** 39CU464  
**Site Name:** N/A  
**Site Type:** Artifact Scatter  
**Cultural Affiliation:** Native American  
**Site Area:** .07 ha  
**Landscape Position:** Hill Slope

**Field Number:** 32-289  
**Elevation (in m):** 1,100  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Not Eligible

### 5.8.1 Site Description

Site 39CU464 (Figures 5.47 and 5.48) was initially recorded as an artifact scatter in 1980 by Kerry Lippincott. Three purple (two retouched) chert flakes and one purple-and-white banded chert flake were noted at that time. ALAC personnel revisited the site during the course of the current investigation. The site boundaries were extended to the south of the original site area. The expanded site measures approximately 47 m N-S x 20 m E-W. The site is situated on an eroded hill slope in short grass pasture and sparse scrub brush. Visibility in the site area averages 60 percent.

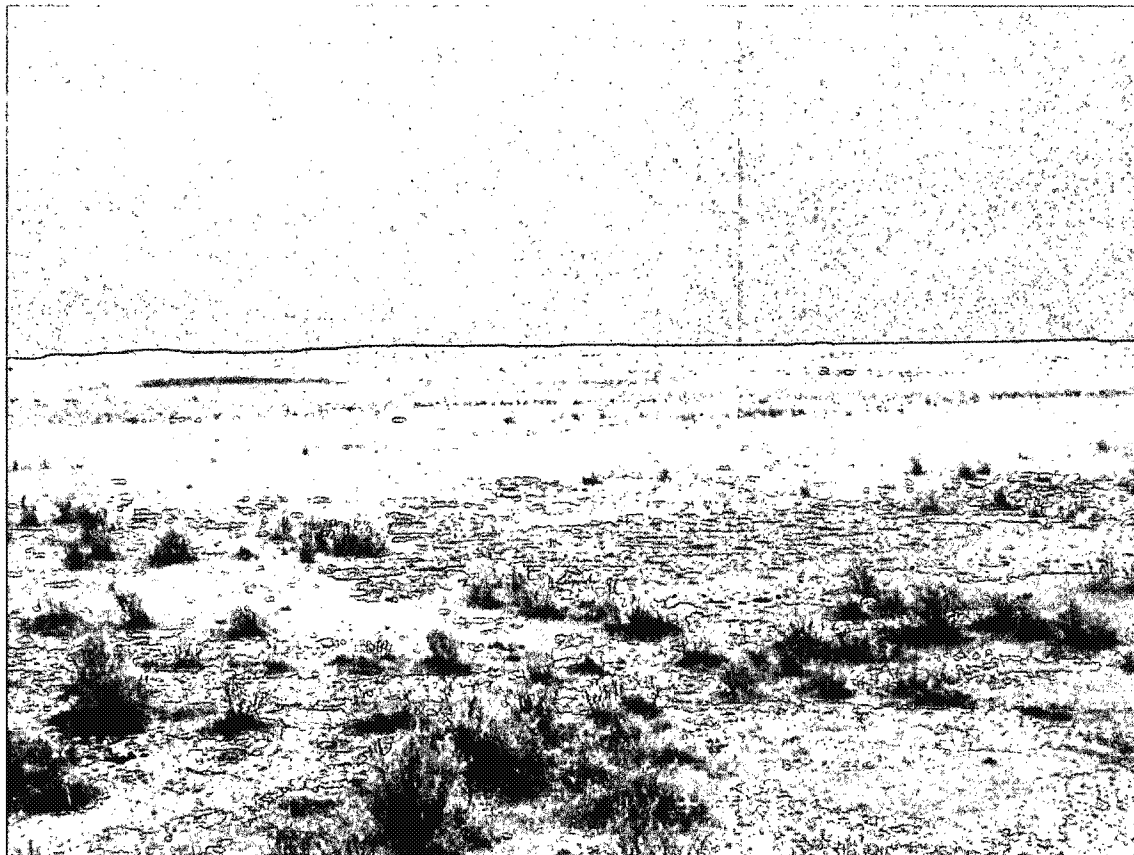


Figure 5.47. Overview of site 39CU464, facing south.

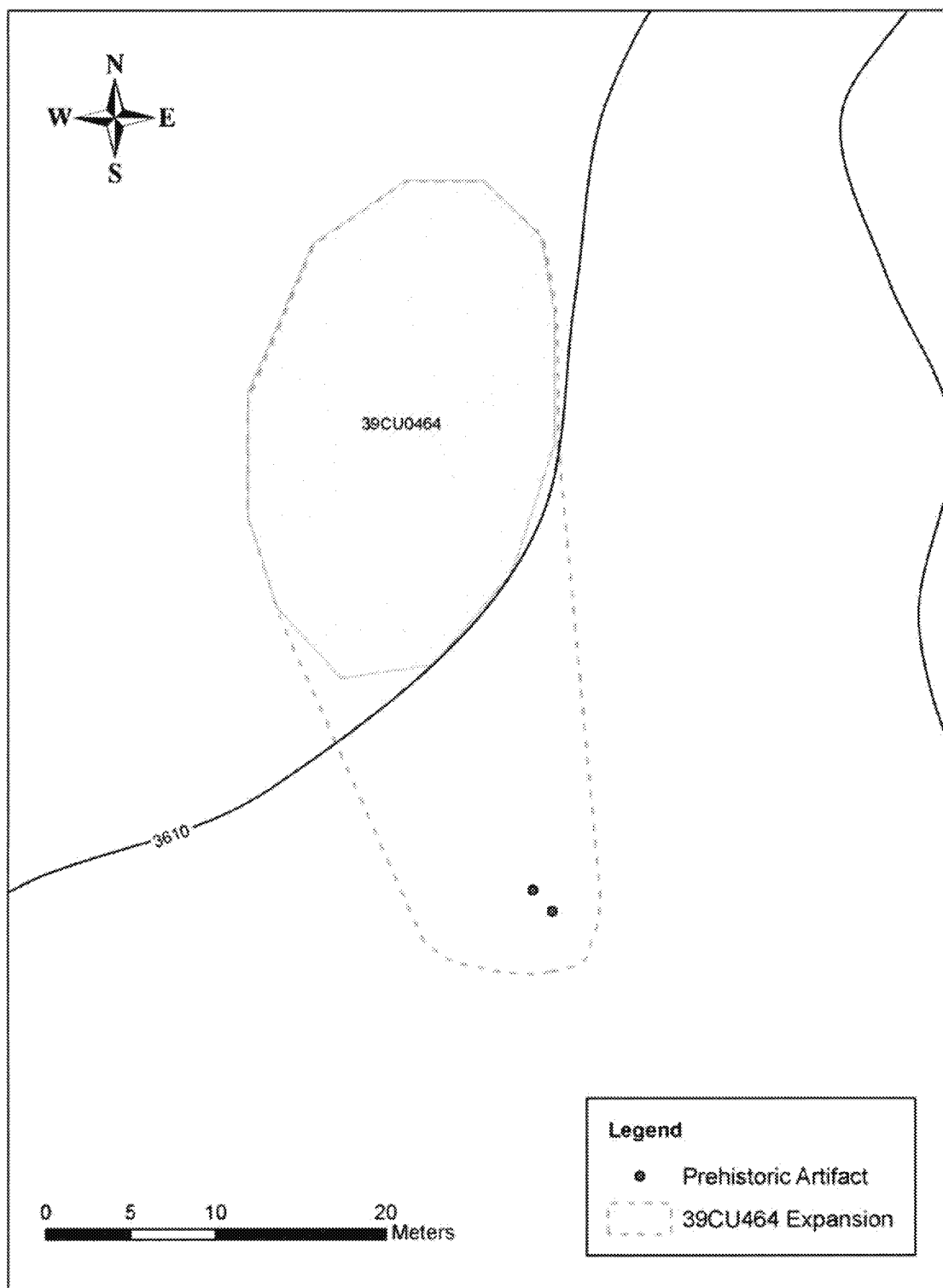


Figure 5.48. Plan view of site 39CU0464 with expanded site boundaries.



### 5.8.2 Artifact and Feature Inventory

One gray quartzite secondary flake and one gray silicified sediment tested pebble were observed. The artifacts were not collected.

### 5.8.3 Interpretation and Recommendations

Site 39CU464 represents a very sparse Native American artifact scatter. The site is situated on an eroded surface.

The NRHP eligibility status of site 39CU464 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The severely eroded landform on which the site is situated indicates no potential for intact subsurface cultural deposits or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU464 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.

## 5.9 SITE 39CU530

**Site Number:** 39CU530

**Site Name:** N/A

**Site Type:** Artifact Scatter, Hearth, Cairn

**Cultural Affiliation:** Native American

**Site Area:** 5.27 ha

**Landscape Position:** Ridge Top/Ridge Slope

**Field Number:** 28-202, 28-213, 28-250

**Elevation (in m):** 1,134

**Site Condition:** Disturbed

**Subsurface Testing:** N/A

**Appendix D Map Reference:** D-1

**NRHP Recommendation:** Unevaluated

### 5.9.1 Site Description

Site 39CU530 was initially documented in 1981 during a survey conducted for the TVA in portions of Custer and Fall River counties, South Dakota, and Weston County, Wyoming (Lippincott 1981). The site was originally recorded as an isolated projectile point located in an intermittent drainage channel west of BBNF land (Lippincott 1981:23). The point was photographed in situ but was not collected. The photograph of the specimen was not, however, included in the report, and no description was provided. ALAC relocated the site and expanded its boundaries on July 27-31, 2007.

Site 39CU530 was documented by ALAC as a sparse, diffuse Native American artifact scatter associated with one cairn and 29 hearth features (Figure 5.49). The site is distributed across a wide expanse of lightly forested ridge tops and slopes, and around an intermittent drainage that bisects the site from north to south. Another small, intermittent drainage heads immediately southwest of the site and trends southeast to its confluence with the aforementioned drainage. A low, broad ridge lobe resting above this confluence marks the southern extent of the site. The currently defined eastern site boundary follows the western property line of the BBNF, and represents the limits of the survey area for the present investigation. As a result, the eastern site boundary is artificial, and although the limits of this investigation do not allow for confirmation, it is probable that the site actually extends further east into BBNF lands.



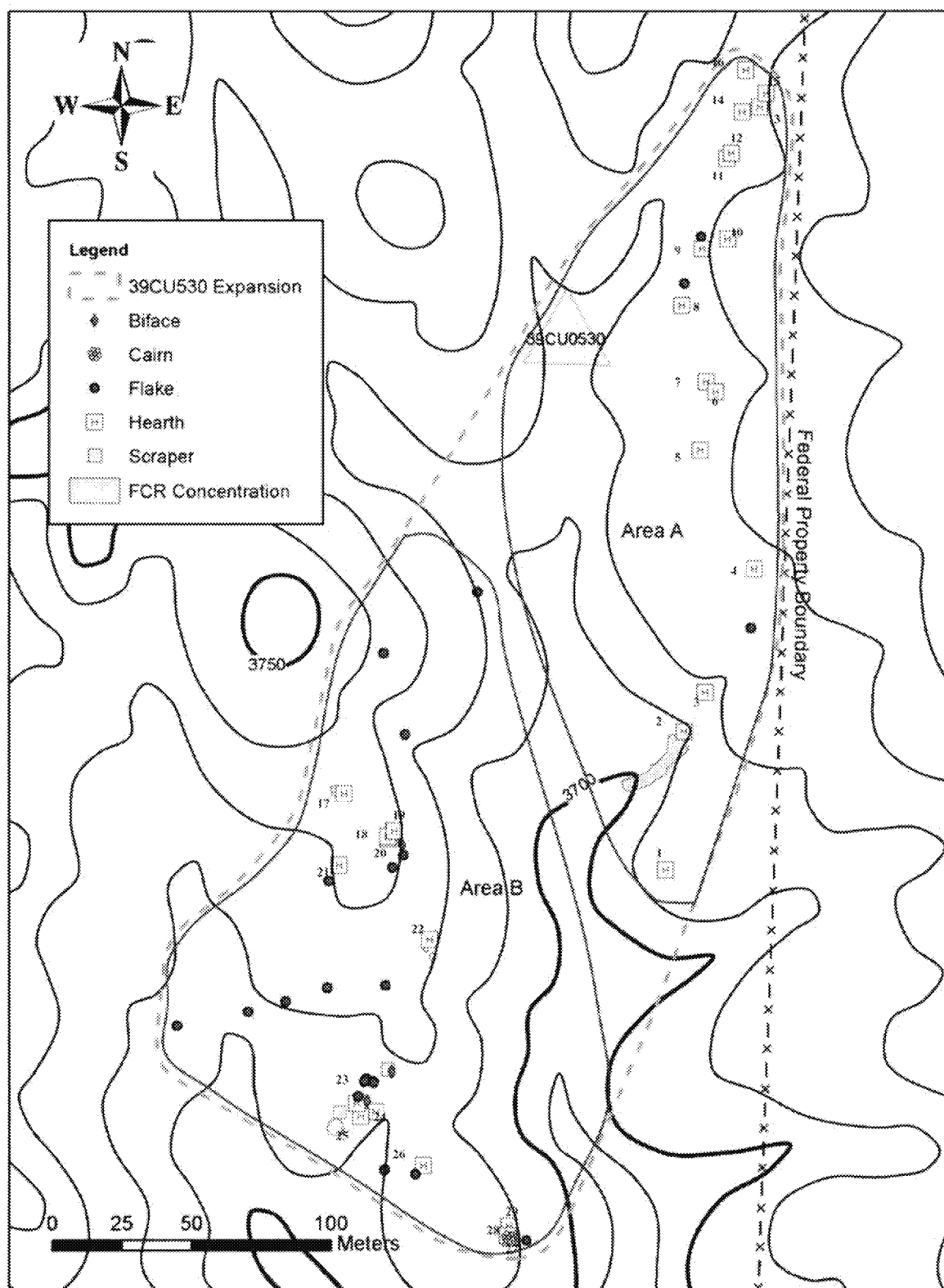


Figure 5.49. Plan view of site 39CU530.



At the time of the current investigation, the site area was primarily short grass pasture interspersed with sagebrush and Ponderosa pines. Vegetation transitions into primarily pine trees in the northeastern portion of the site area. Visibility in the site area averages 45 percent. The expanded site area measures approximately 433 m N-S x 288 m E-W. Because of its size, the site has been divided into two sub-areas based on concentrations of artifact material and features observed. These areas are referred to as Concentrations A and B.

Concentration A is located in the northern and easternmost portions of the site along the top and slope of the north/south-trending ridge (Figure 5.50; see Figure 5.49). This portion of the site, predominantly along the hilltop and slope, has been heavily deflated by slope wash and wind erosion. Very little topsoil development was evidenced here, and numerous gravel and bedrock exposures were observed. Artifacts and features observed in this portion of the site are almost entirely situated along the eastern edge of the drainage way that bisects the site; however, the projectile point originally documented within the drainage way is also included in this concentration.

Concentration B is located in the southern and westernmost portions of the site along the low, broad ridge lobe that lies between the two intermittent drainages (Figure 5.51; see Figure 5.49). This portion of the site retains significantly more intact soil deposits than Concentration A, and although scattered exposures of shale are present, they are not as prevalent as in the northern portion of the site.



Figure 5.50. Overview of Concentration A, site 39CU530, facing north.



Figure 5.51. Overview of Concentration B, site 39CU530, facing southeast.

### 5.9.2 Artifact and Feature Inventory

Artifacts documented from Concentration A are listed in Table 5.12, while those artifacts documented from Concentration B are listed in Table 5.13. One artifact, an incomplete biface (catalog number 28-213-1), was collected from the site during the current investigation. In addition to the artifacts, 29 hearths and 1 cairn were observed within the site. All of the artifacts and features from this site were documented surficially; however, a number of the documented hearths were eroding out of slopes and likely retain intact portions below surface.

Table 5.12. Artifacts Observed at Concentration A, Site 39CU530.

Number	Artifact Type	Material	Colors	Comments
2	Primary flake	Quartzite	Red, yellowish brown	
1	Primary flake	Chalcedony	Light gray	
1	Tertiary flake	Chert	Yellowish brown	Utilized
1	Biface	Quartzite	Pink-gray	
1	Utilized pebble	Quartzite	Tan	
1	Tested pebble	Chalcedony	Light gray	
1	Shatter	Quartzite	Pink-gray	
1	FCR concentration	Various limestone, sandstone, and quartzite fragments	Various	Probable hearth locality, although too eroded for confirmation



Sixteen hearth features (Hearths 1-16) were observed in Concentration A of the site. The mean diameter of these features measures approximately 90 cm; however, they range in size from 60 cm in diameter to 1.5 m in diameter. The hearth features consist of hundreds of small limestone, sandstone, and quartzite FCR fragments (Figures 5.52-5.54). No burned earth or charcoal flecks were observed; however, none of the features from this site were sampled. Though portions of each of these features have eroded, a number of them appear to have been exposed only recently and remain largely intact. Hearths 3, 6, 10, 11, and 14 are no longer intact, and photographs of these features are not included.

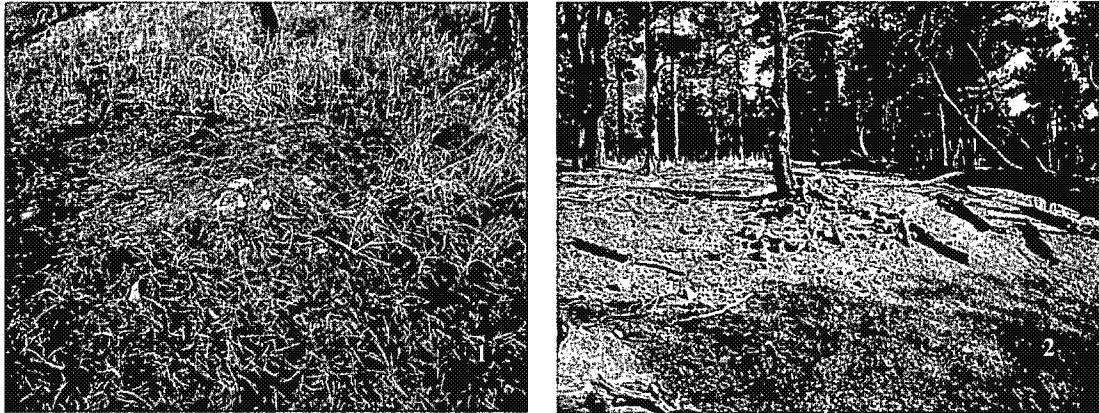


Figure 5.52. Close-up of Hearths 1 and 2, Concentration A, site 39CU530.

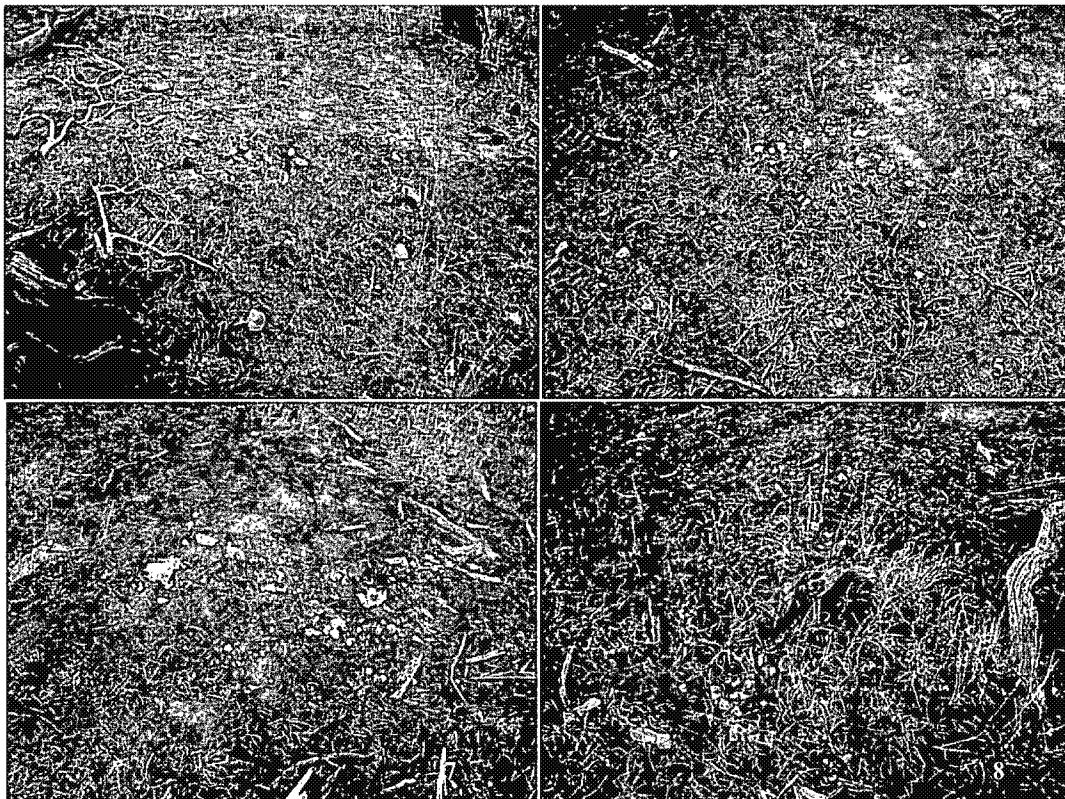


Figure 5.53. Close-up of Hearths 4, 5, 7, and 8, Concentration A, site 39CU530.

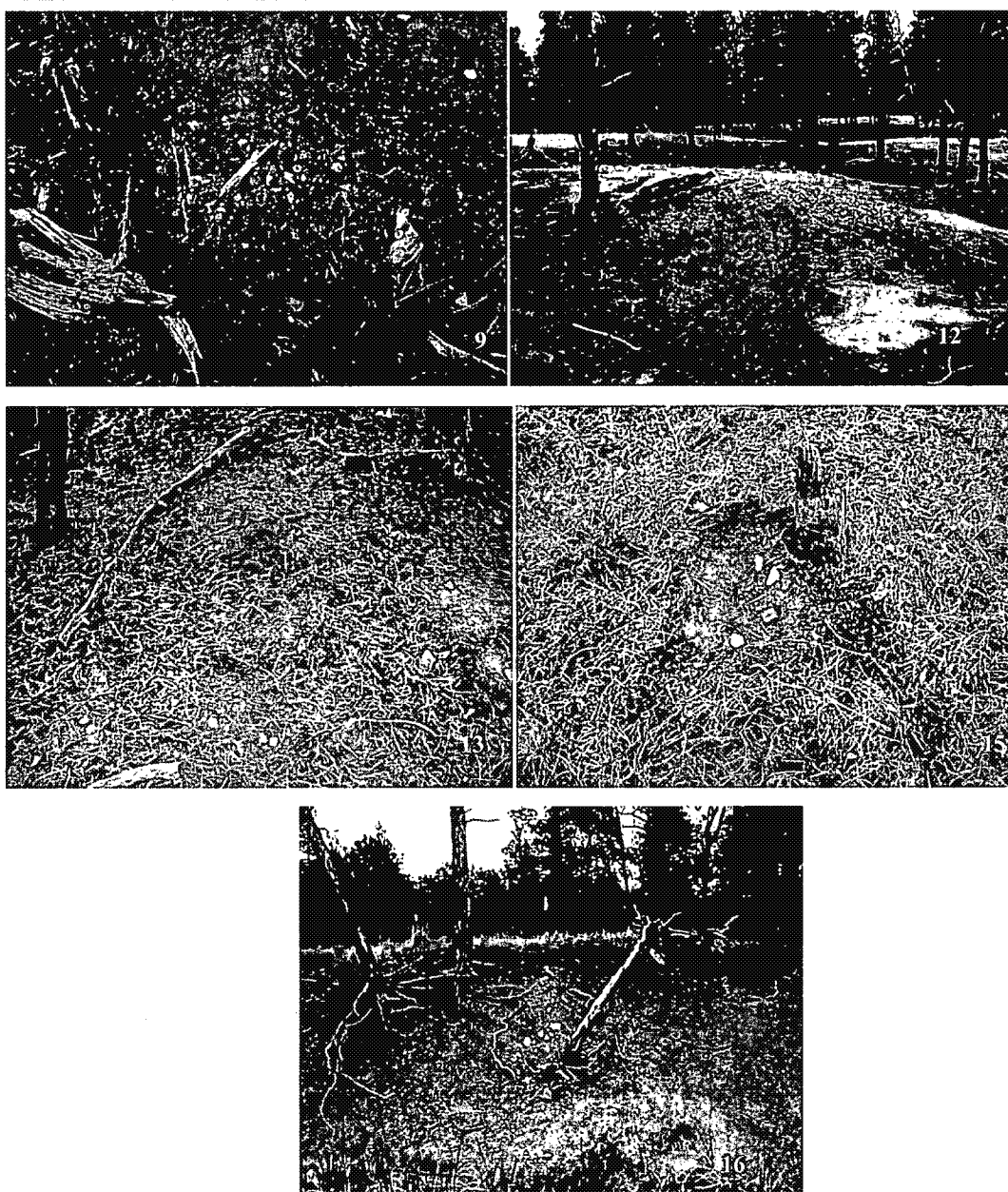


Figure 5.54. Close-up of Hearths 9, 12, 13, 15, and 16, Concentration A, site 39CU530.

Table 5.13. Artifacts Observed at Concentration B, Site 39CU530.

Number	Artifact Type	Material	Colors	Comments
1	Primary flake	Quartzite	Dark gray	
2	Primary flake	Chalcedony	Light gray, tan	
1	Secondary flake	Chalcedony	Light gray	
3	Tertiary flake	Chert	Gray-red, mottled	



Table 5.13 (continued).

Number	Artifact Type	Material	Colors	Comments
3	Tertiary flake	Quartzite	Brown	
1	Tertiary flake	Chalcedony	Brown	Retouched
3	Tertiary flake	Chert	Gold-brown, gold, purple	One retouched
1	Spall	Chert	Purple-gray	Retouched
2	Core	Chalcedony	Light gray, gray	
1	Biface fragment	Quartzite	Light gray	Collected; catalog #28-213-1
1	Biface	Chert	Yellowish brown	
1	Biface fragment	Quartzite	Brown	
1	End scraper	Chert	Purple	
1	End scraper	Quartzite	Purple	
1	Shatter	Quartzite	Red	
2	FCR concentrations	Various limestone, sandstone, and quartzite fragments	Various	Probable hearth localities, though too eroded for confirmation

One incomplete biface (catalog number 28-213-1; Figure 5.55) was collected from Concentration B of the site. The specimen is ovoid in shape and exhibits a pointed distal tip. The specimen was broken and is missing the proximal end. It was produced on a medium-grained, light gray-colored quartzite with inclusions. The specimen measures 41.7 mm in length (broken), 35.5 mm in width, and 10.0 mm in thickness.

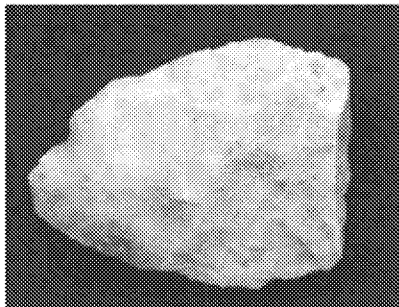


Figure 5.55. Incomplete biface specimen, Concentration B, site 39CU530 (catalog number 28-213-1).

Thirteen hearth features (Hearths 17-29) were observed in Concentration B of the site. The mean diameter of these features measures approximately 75 cm; however, they range in size from 60 cm in diameter to 1.1 in diameter. The features all consist of hundreds of small limestone, sandstone, and quartzite FCR fragments (Figures 5.56 and 5.57). No burned earth or charcoal flecks were observed; however, none of the features from this site were sampled. Though portions of each of these features have eroded, a number of them appear to have been exposed only recently and remain largely intact. Hearth 26 is not intact, and a photograph of this feature is not included.



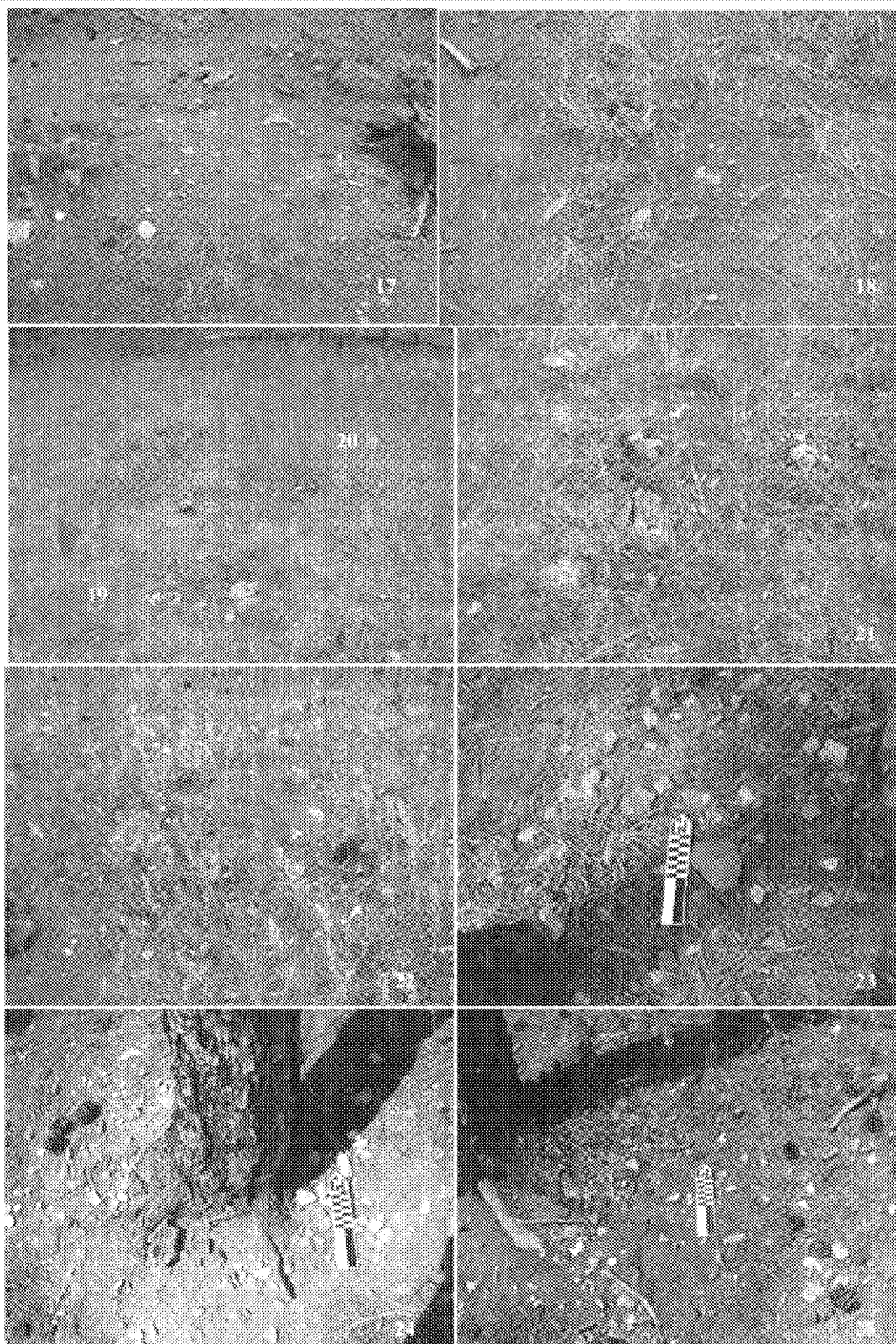


Figure 5.56. Close-up of Hearths 17-25, Concentration B, site 39CU530.

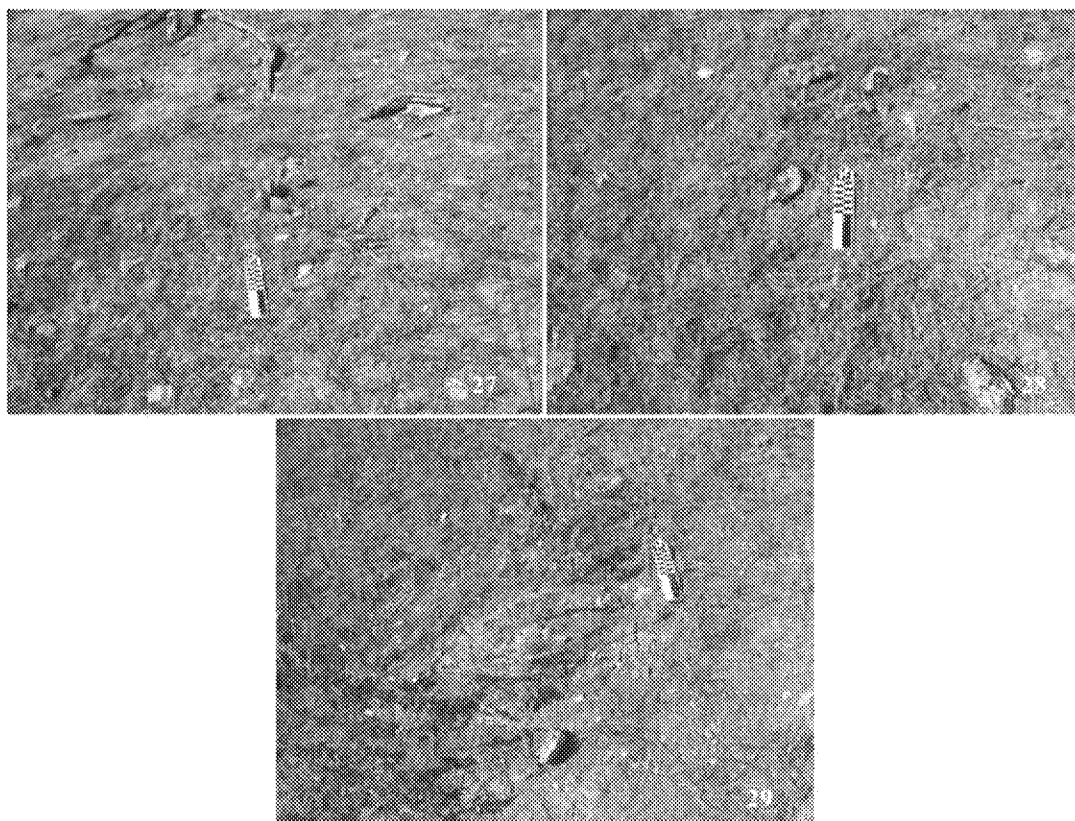


Figure 5.57. Close-up of Hearths 27-29, Concentration B, site 39CU530.

One cairn feature (Cairn 1) was observed in Concentration B of the site (Figure 5.58). The cairn is roughly circular in shape, measuring approximately 80 cm in diameter. It consists of approximately nine visible, locally-derived cobbles of granitic composition. A small number of cobbles are broken, but the feature, as a whole, appears to remain largely intact.



Figure 5.58. Close-up of Cairn 1, Concentration B, site 39CU530.





### 5.9.3 Interpretation and Recommendations

Site 39CU530 represents a Native American artifact scatter, cairn, and 29 associated hearth features. Portions of the site, specifically within the northern area of Concentration A, have been subjected to erosion from wind and water, such that a significant amount of the landscape there has deflated to gravel and bedrock exposures. Additional areas of the site, specifically along the ridge lobe in Concentration B, appear to retain intact soil deposits.

The artifact assemblage documented at the site, though diffuse, is representative of all stages of lithic tool production. It includes material from cores and tested pebbles to several complete tool specimens. The large quantity of hearth localities and FCR concentrations in close proximity to multiple drainage ways, coupled with the aforementioned artifact assemblage, is strongly indicative of a large occupation camp. However, no additional features or depressions associated with possible dwelling areas were observed, and the length of time that this particular area may have been occupied is unknown. Additionally, the lack of available information concerning the previously recorded projectile point (Lippincott 1981) precludes the assignment of a more precise temporal range for the occupation of the site.

The function of Cairn 1 remains to be determined. Historic and ethnographic documentation of aboriginal cairns in the Black Hills indicates that these monuments served various roles throughout the Black Hills, including: resource area markers, landmarks, trail markers, camp markers, burial markers, cache markers, ceremonial/spiritual area markers (Wolf 1996:3f-25), and drive line components (Brink and Rollans 1990:153). Cairn 1 is not large enough to accommodate the mortuary remains of an adult human; only the remains of an infant could have been placed beneath this feature.

It should be noted that the construction of such cairn features is not a hallmark solely indicative of aboriginal inhabitants. Modern-day hikers have been known to construct cairns as trail markers, and Frison (1991:363) cites research that documents current sheepherders constructing a multitude of stone features, such as cairns and walls, simply as a means of passing time. Ethnographic evidence recently obtained from Wind Springs Ranch, north of Scottsbluff in western Nebraska, confirms that sheepherders have constructed comparable stone features under similar circumstances further south on the Plains (David Hushson, Wind Springs Ranch owner, personal communication 2008). Although it is important to recognize this research, initial evidence does suggest that Cairn 1 is associated with a Native American presence at this site.

The NRHP eligibility status of site 39CU530 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The NRHP eligibility status of site 39CU530 could not be definitively ascertained within the scope of the current investigation. The function of the cairn at this site is currently unclear. ALAC recommends that this site be considered unevaluated in terms of its eligibility status for listing on the NRHP. Additional evaluation is recommended for site 39CU530.



## 5.10 SITE 39CU531

**Site Number:** 39CU531

**Site Name:** N/A

**Site Type:** Artifact Scatter, Hearth

**Cultural Affiliation:** Native American (Late Archaic/Plains Woodland),  
Euroamerican

**Site Area:** 2.62 ha

**Landscape Position:** Terrace and Scarp

**Field Number:** 32-264

**Elevation (in m):** 1,103

**Site Condition:** Disturbed

**Subsurface Testing:** N/A

**Appendix D Map Reference:** D-1

**NRHP Recommendation:** Not Eligible

### 5.10.1 Site Description

Site 39CU531 was originally identified in 1984 as a scatter of chipped stone flakes, cores, and tools as well as several early to mid-twentieth century rifle cartridges. The site is located on an eroded terrace and scarp about 200 m east of Beaver Creek. The 2007 ALAC investigation relocated and expanded the boundaries of the site some distance to the east. ALAC identified a hearth and artifact scatter; however, no Euroamerican material was noted during the present investigation. The current site area measures approximately 209 m N-S x 303 m E-W (Figures 5.59 and 5.60). The site area is covered with scrub vegetation offering visibility of about 70 percent. Much of the site is eroded down to shale and other bedrock.



Figure 5.59. Overview of site 39CU531, facing southeast

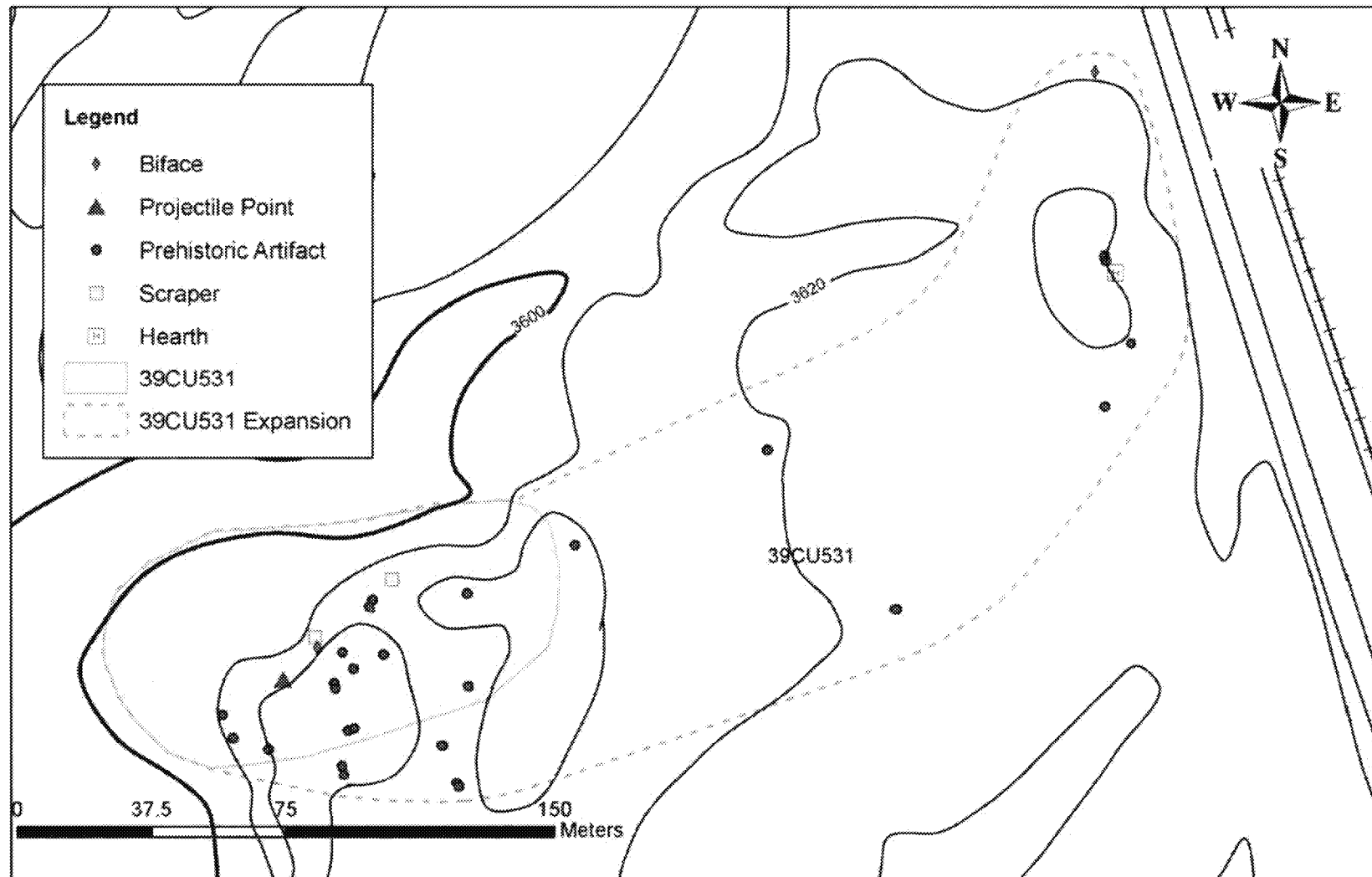


Figure 5.60. Plan view of site 39CU531.



### 5.10.2 Artifact and Feature Inventory

Artifacts recorded at site 39CU531 consist of 30 pieces of chipped stone flaking debris and tools (Table 5.14). Lithic materials represented include quartzite, chalcedony and chert. One projectile point was retained for laboratory analysis. The field investigation also resulted in the observation of a single eroded hearth feature near the eastern margin of the site.

The collected specimen is a rather large (49.4 mm long, 25.2 mm wide, and 5.6 mm thick), complete, corner-notched projectile point (catalog number 32-264-1; Figure 5.61). It has a straight base and slightly excurvate blade margins. It is made from a brown fine-grained quartzite. This projectile point is a typical Pelican Lake form commonly recovered from Late Archaic and Plains Woodland sites in the Central and Northern Plains (Frison 1991:104; Wettlaufer 1955).

Table 5.14. Artifacts Observed at Site 39CU531.

Number	Artifact Type	Material	Colors	Comments
1	Primary flake	Quartzite	Gray	
2	Primary flake	Chert	White and brown banded, light gray	
3	Secondary flake	Quartzite	Tan-gray, purple	
3	Secondary flake	Chert	Tan-gray	One retouched
1	Secondary flake	Unknown	Unknown	
4	Tertiary flake	Chert	Purple and white, purple, pink-gray	One utilized
4	Tertiary flake	Quartzite	Light gray, red, brown, light brown	One retouched
1	Tertiary flake	Chalcedony	Light gray	
1	Utilized flake	Unknown	Unknown	
1	Projectile point	Quartzite	Brown	Collected; catalog #32-264-1
1	Biface	Chalcedony	Brown	
1	Biface	Chert	Purple	
1	Scraper	Quartzite	Red	
1	Scraper	Chalcedony	Gray-brown	
1	Spokeshave	Chert	Brown	
1	Tested pebble	Chert	Tan	Retouched/utilized
1	Tested pebble	Chert	Red	
1	Tested pebble	Chalcedony	Light gray	
1	Tested cobble	Quartzite	Yellowish brown	

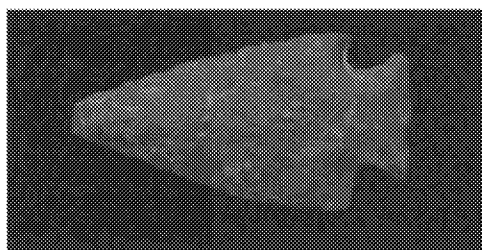


Figure 5.61. Complete corner-notched projectile point (catalog number 32-264-1) collected from site 39CU531.



### 5.10.3 Interpretation and Recommendations

Site 39CU531 is a very eroded scatter of Native American lithic debris and tools. A single hearth feature at the eastern margin of the site is eroded and no longer intact. Minimally, the site is associated with either the Late Archaic or Plains Woodland periods.

The NRHP eligibility status of site 39CU531 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The severely eroded landscape on which the site is situated indicates no potential for intact buried cultural deposits or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU531 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.

### 5.11 SITE 39CU532

**Site Number:** 39CU532  
**Site Name:** N/A  
**Site Type:** Artifact Scatter  
**Cultural Affiliation:** Native American  
**Site Area:** 2.43 ha  
**Landscape Position:** Ridge Slope

**Field Number:** 33-223  
**Elevation (in m):** 1,109  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Not Eligible

#### 5.11.1 Site Description

Site 39CU532 was originally identified by Kerry Lippincott (Lippincott 1981) as an artifact scatter. Lippincott noted a plate chalcedony knife fragment, brown quartzite flakes (one retouched), a brown quartzite core fragment, and white chert flakes. ALAC personnel relocated and expanded the boundaries of the site to the northwest during the 2007 investigation. The site is located on a ridge slope overlooking the Beaver Creek valley to the west. The expanded site area measures approximately 223 m N-S x 270 m E-W (Figures 5.62 and 5.63). The site area is covered with scrub vegetation offering visibility of about 50 percent. Much of the site is eroded down to shale and other bedrock.

#### 5.11.2 Artifact and Feature Inventory

Artifacts recorded at site 39CU532 consist of 15 pieces of chipped stone flaking debris, a scraper, and an expended core (Table 5.15). Lithic materials represented include quartzite, chalcedony, chert, and silicified sediment. The scraper was collected. No cultural features were observed.

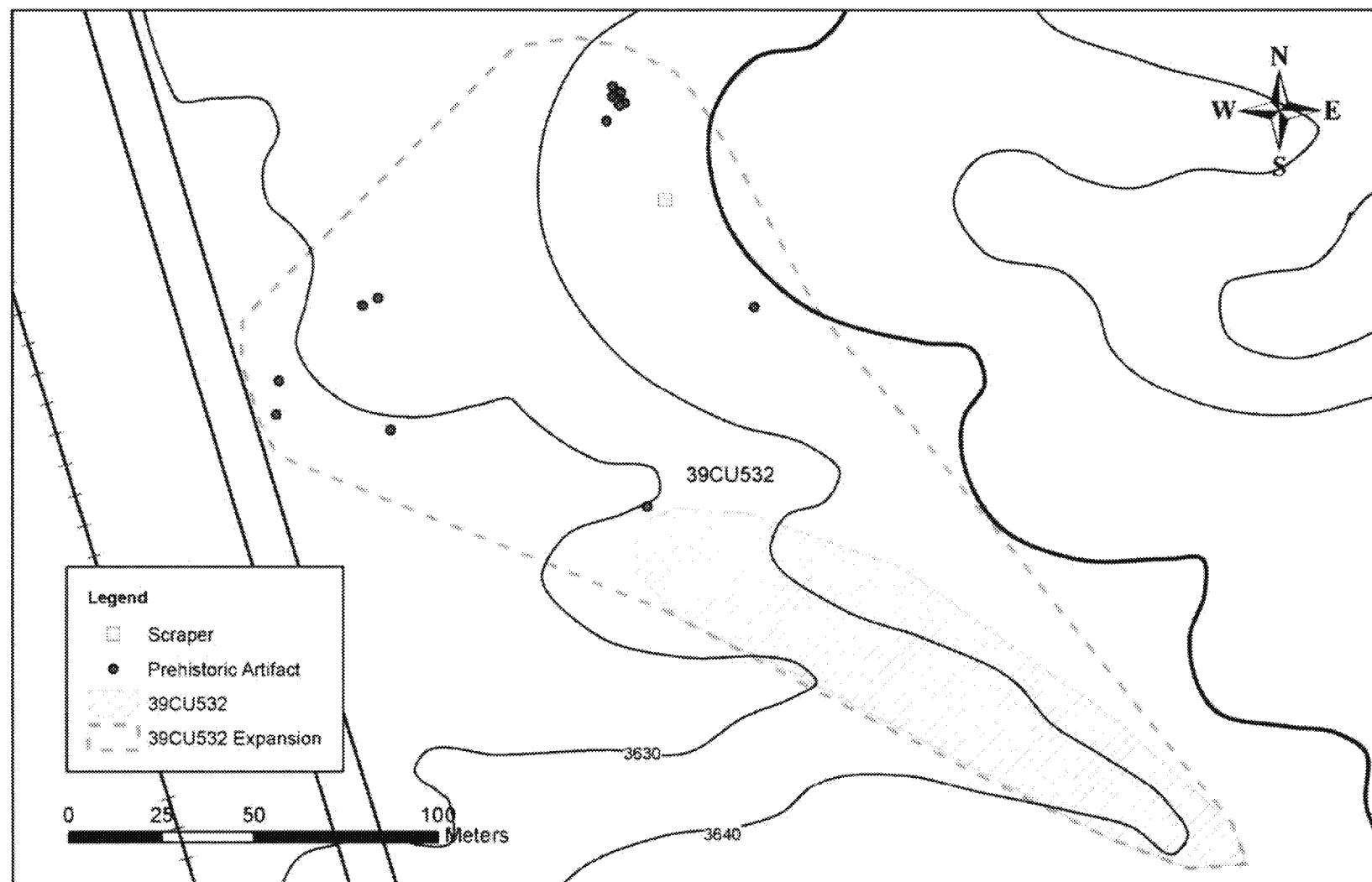


Figure 5.62. Plan view of site 39CU532.



Figure 5.63. Overview of site 39CU532, facing north.

Table 5.15. Artifacts Observed at Site 39CU532.

Number	Artifact Type	Material	Colors	Comments
1	Primary flake	Quartzite	Pink	
1	Secondary flake	Silicified sediment	Gray	
1	Secondary flake	Chalcedony	Light gray	
5	Tertiary flake	Chert	Pinkish gray, purple, light purple	
4	Tertiary flake	Chalcedony	Light gray, white	
1	Tertiary flake	Quartzite	Light gray	
2	Reduction fragment	Chalcedony	Gray, light gray	
1	Expended core	Chert	Gray	
1	Scraper	Quartzite	Yellowish brown	Collected; catalog #33-223-1

A complete triangular end scraper was collected during the documentation of site 39CU532 (catalog number 33-223-1; Figure 5.64). It is made of a very fine-grained yellowish brown quartzite with dark inclusions. The working bit edge angle is 65°. The total length of the scraper is 29.8 mm.

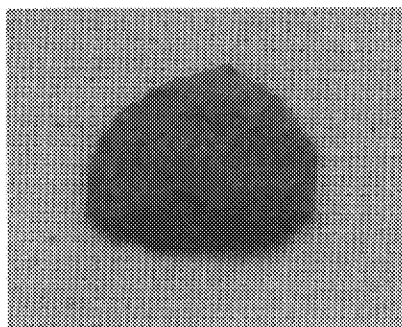


Figure 5.64. Site 39CU532, end scraper (catalog number 33-223-1).

### 5.11.3 Interpretation and Recommendations

Site 39CU532 represents a sparse prehistoric artifact scatter. Much of the site is eroded down to shale or bedrock.

The NRHP eligibility status of site 39CU532 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The severely eroded landform on which the site is situated indicates no potential for intact subsurface cultural deposits or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU532 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.

### 5.12 SITE 39CU556

**Site Number:** 39CU556  
**Site Name:** N/A  
**Site Type:** Artifact Scatter  
**Cultural Affiliation:** Native American  
**Site Area:** 2.17 ha  
**Landscape Position:** Rolling Plain/Hill Base

**Field Number:** 34-77  
**Elevation (in m):** 1,124  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Unevaluated

#### 5.12.1 Site Description

Site 39CU556 is a very sparse, but extensive, scatter of Native American lithic material originally identified by Kerry Lippincott in 1984 and listed as Late Archaic. ALAC personnel relocated the site and expanded its boundary (Figures 5.65 and 5.66). The site is at the base and lower reaches of a gentle slope a short distance west of an ephemeral tributary of Pass Creek. The expanded site area measures approximately 87 m N-S x 337 m E-W. The site area is covered with scrub vegetation offering visibility of about 50 percent. Cultural materials were generally found in a wide, shallow washout with exposed gravels; however, additional portions of the site appear to retain intact soil deposits.



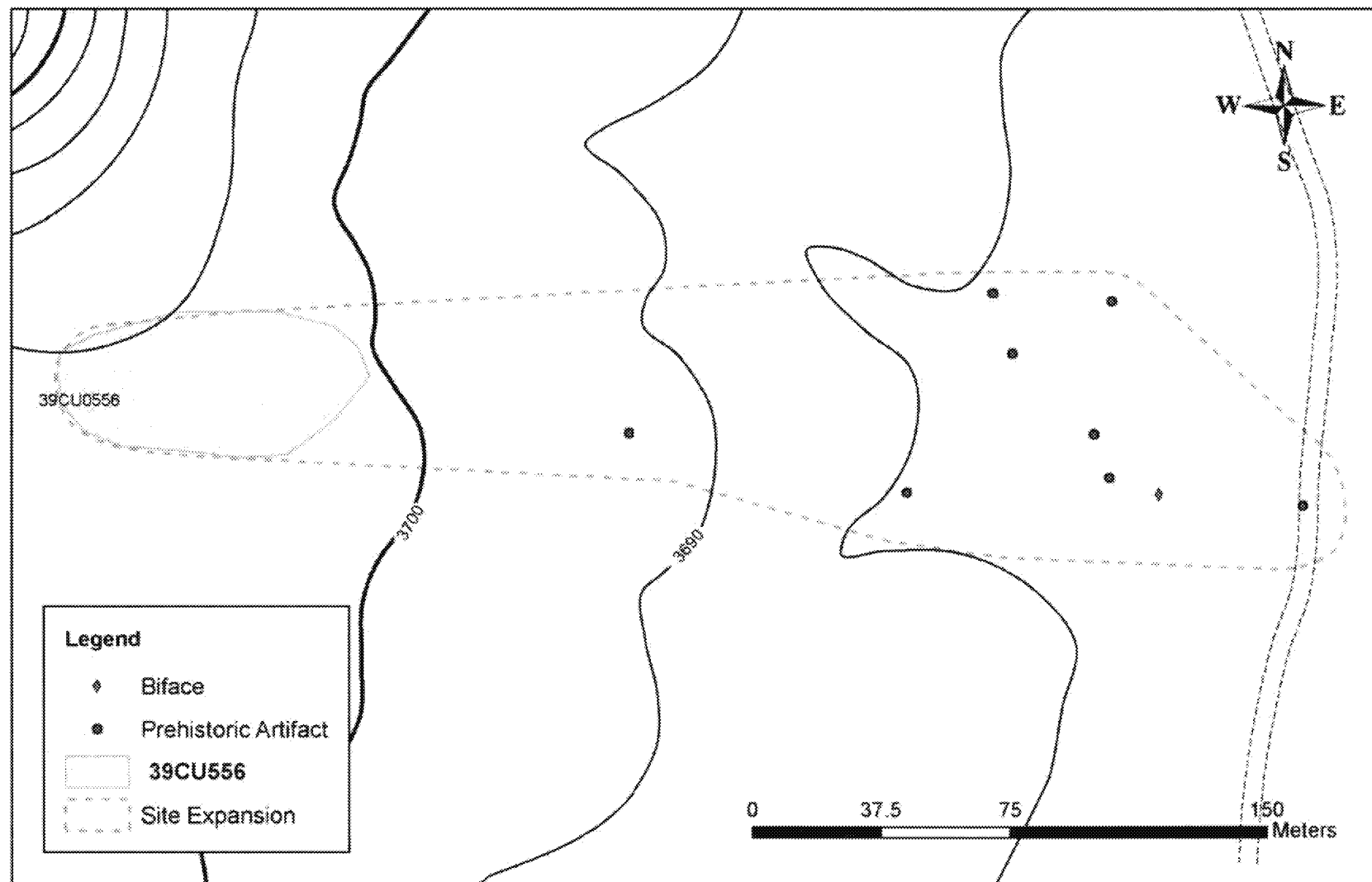


Figure 5.65, Plan view of site 39CU556.

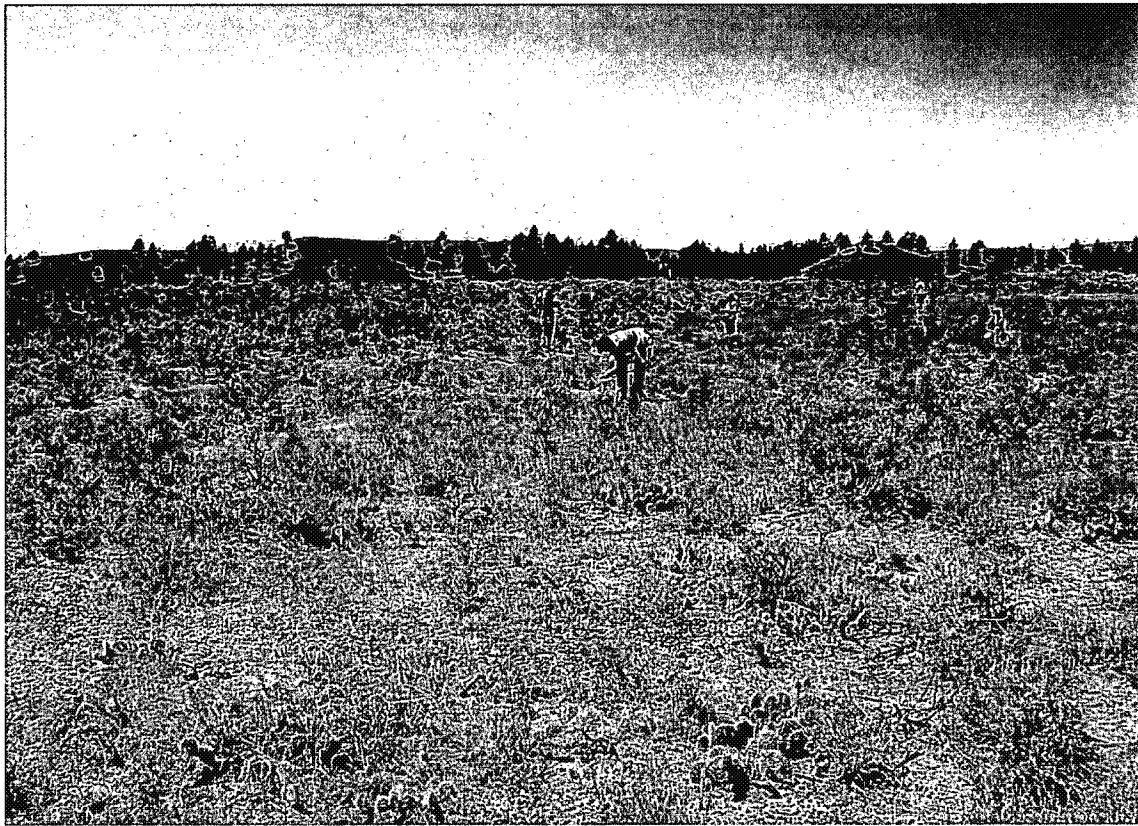


Figure 5.66. Overview of site 39CU556, facing east.

### 5.12.2 Artifact and Feature Inventory

Artifacts recorded at site 39CU556 consist of 12 pieces of chipped stone flaking debris and one biface fragment (Table 5.16). Lithic raw materials represented include quartzite, chalcedony, and chert. No artifacts were collected. No cultural features were observed.

Table 5.16. Artifacts Observed at Site 39CU556.

Number	Artifact Type	Material	Colors	Comments
1	Primary flake	Quartzite	Gray	
1	Secondary flake	Chalcedony	Light gray	
1	Tertiary flake	Quartzite	Gray	
2	Tertiary flake	Chalcedony	Light gray	
6	Tertiary flake	Unknown	Unknown	
1	Flake	Chert	Yellowish brown	Retouched
1	Biface	Unknown	Unknown	

### 5.12.3 Interpretation and Recommendations

Site 39CU556 is a relatively sparse scatter of Native American lithic debris and one tool. It was listed as Late Archaic in 1984 although temporally diagnostic artifacts were not observed during ALAC's 2007 reevaluation of the site. Portions of the site appear to retain intact soil deposits. This suggests that there is potential for buried, intact cultural deposits or zones within this portion of the APE.



The NRHP eligibility status of site 39CU556 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The NRHP eligibility status of the site could not be definitively ascertained within the scope of the current investigation. ALAC recommends that this site be considered unevaluated in terms of its eligibility status for listing on the NRHP. Additional evaluation is recommended for site 39CU556 consisting of subsurface testing to determine if substantial intact cultural deposits are extant with the potential to yield archeological data amenable to addressing pertinent and important research questions.

### 5.13 SITE 39CU557

**Site Number:** 39CU557

**Site Name:** N/A

**Site Type:** Artifact scatter

**Cultural Affiliation:** Native American (Middle Archaic-Plains Woodland)

**Site Area:** 36.02 ha

**Landscape Position:** Rolling Plain

**Field Number:** 29-210, 29-212, 32-3, 32-211, 32-288

**Elevation (in m):** 1,103

**Site Condition:** Disturbed

**Subsurface Testing:** N/A

**Appendix D Map Reference:** D-1

**NRHP Recommendation:** Not Eligible

#### 5.13.1 Site Description

Site 39CU557 was originally documented by Charles A. Reher in 1981 during a survey conducted for the TVA in portions of Custer and Fall River counties, South Dakota, and Weston County, Wyoming (Reher 1981). Recorded as a small occupation, the site is described as an artifact scatter with additional fire pit features. The site was tested by hand excavations as well as "extensive backhoe trenches" (Reher 1981:3). All hearth features documented by Reher were heavily deflated and yielded no material suitable for radiocarbon dating. The artifact assemblage is described as sparsely distributed with only shallow subsurface deposits in the sod areas (Reher 1981:3). Cultural resources clearance was recommended by Reher following the testing of this site (Reher 1981:3). No artifact inventory is provided in the report; however, two photographic plates depict a number of lithic biface and uniface tools, as well as a small, side-notched projectile point of indeterminate cultural affiliation (Reher 1981:3). ALAC relocated the site on April 19, 2007.

Site 39CU557 was re-examined and documented by ALAC as a Native American lithic scatter situated on a level alluvial terrace north of Beaver Creek (Figures 5.67-5.69). The site is bisected by an unnamed intermittent drainage that empties into the creek south of the site. At the time of the current investigation, the site area was in short grass pasture interspersed with prickly pear cacti. The vegetation afforded 50 percent ground surface visibility. The site lies immediately west of an active segment of the BN Railroad (site 39CU2000). The current site area measures approximately 940 m N-S x 587 m E-W. Because of its areal extent, site 39CU557 has been divided into two sub-areas based on the segregation of the artifacts to the north and south of the intermittent drainage. The site area evidences severe erosion by wind and water and retains little intact topsoil.

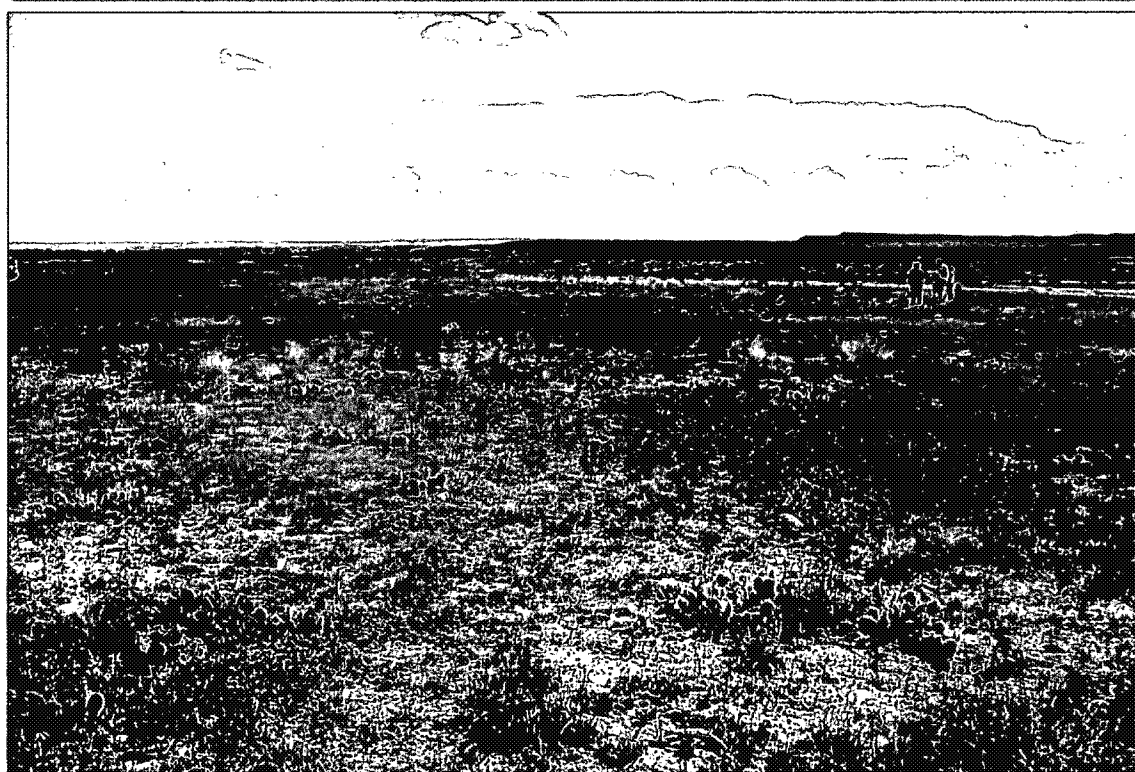


Figure 5.67. Overview of northern portion of site 39CU557, facing south.



Figure 5.68. Overview of southern portion of site 39CU557, facing south-southwest.

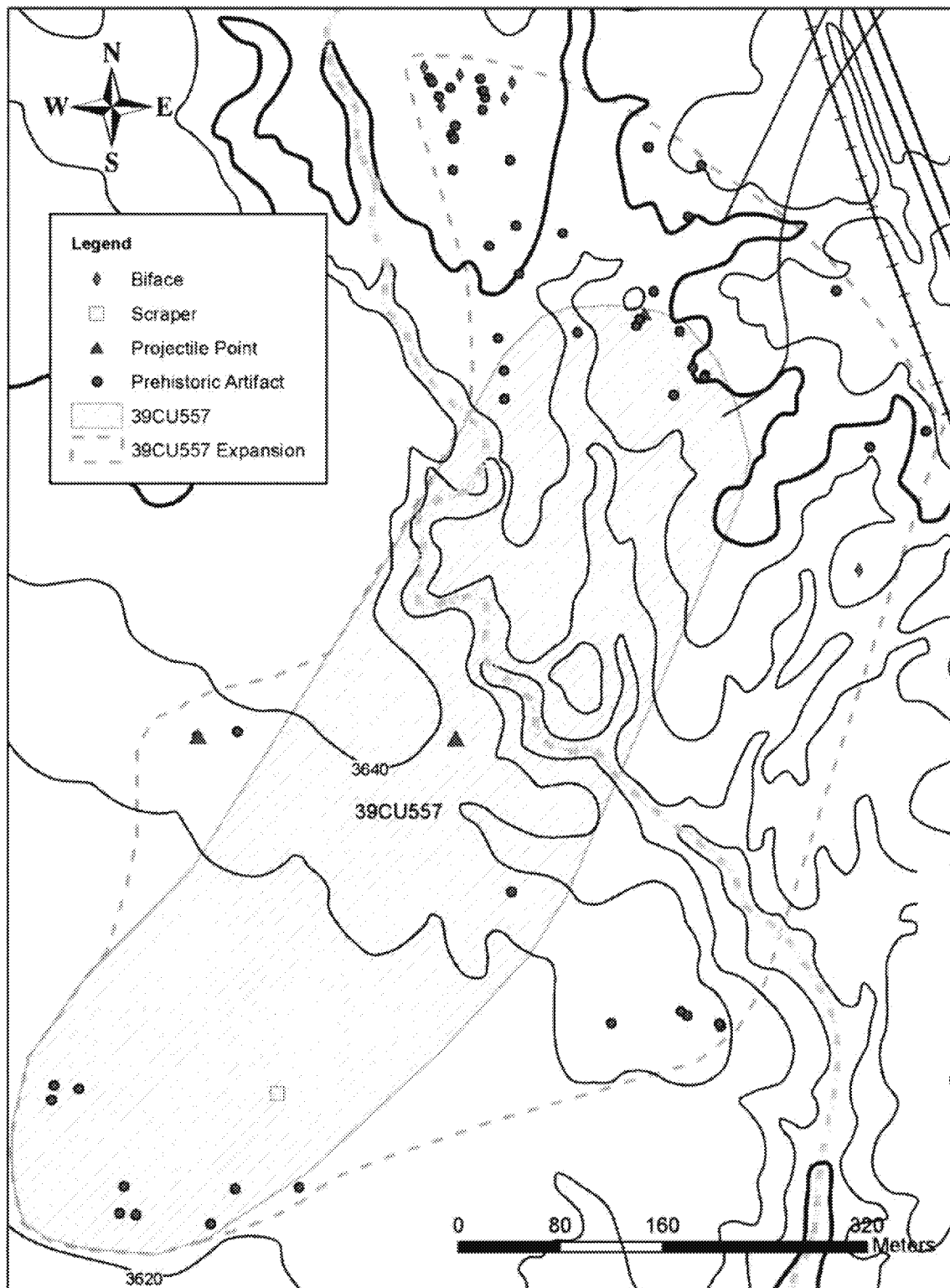


Figure 5.69. Plan view of site 39CU557.



### 5.13.2 Artifact and Feature Inventory

Artifacts documented from site 39CU557 are listed in Table 5.17. Two projectile points (catalog numbers 29-210-1 and 32-288-1) and five bifaces (catalog numbers 29-210-2—29-210-5; and 29-212-7) were collected from the site during the current investigation. No features were observed at the time of the current investigation. All artifacts were documented surficially.

Table 5.17. Artifacts Observed at Site 39CU557.

Number	Artifact Type	Material	Colors	Comments
3	Primary flake	Quartzite	Pale yellow, red, red-gold	
4	Primary flake	Chert	Banded purple-gray, pink-purple, brown, light gray	
1	Primary flake	Silicified sediment	Gray	Utilized
3	Secondary flake	Chert	Purple, gray	
2	Secondary flake	Quartzite	Brown	
15	Tertiary flake	Quartzite	Brown, pale brown, red, pink, white, light gray, dark gray	
5	Tertiary flake	Chalcedony	Gray, light gray, white	
5	Tertiary flake	Chert	Purple, pink, light gray	
1	Tertiary flake	Silicified sediment	Brown	
1	Flake	Chert	Purple	Retouched
1	Flake	Quartzite	Dark brown	Large; retouched
2	Flake	Chalcedony	Mottled brown, pink	Two bifacially retouched
1	Projectile point fragment	Chert	Moderate brown	Collected; catalog #29-210-1
1	Biface	Chert	Red, purple	
1	Biface	Chert	Gray	Crude
1	End scraper	Unknown	Unknown	
1	Biface fragment	Quartzite	Very light gray	Collected; catalog #29-210-2
1	Biface fragment	Quartzite	Very dusky purple	Collected; catalog #29-210-3
1	Biface fragment	Quartzite	Pale yellowish brown	Collected; catalog #29-210-4
1	Biface fragment	Quartzite	Very light gray	Collected; catalog No. 29-210-5
1	Biface fragment	Chert	Dark red	Distal tip
1	Core	Chert	Brown	
1	Core	Chalcedony	White	
1	Shatter	Chert	White	
1	Tested pebble	Chalcedony	Gray	
3	Tested pebble	Chert	Purple, brown	Two utilized, one retouched
3	Tested pebble	Quartzite	Brown, pink	One retouched
1	Tested pebble	Silicified sediment	Red-brown	
1	Projectile point	Chert	Dusky red	Collected; catalog #32-288-1
1	Biface	Chert	Grayish red-purple	Collected; catalog #29-212-7



Four biface fragments were collected from the northern portion of the site. The first specimen (catalog number 29-210-2; Figure 5.70) is a pointed distal tip manufactured from a very light gray quartzite that exhibits dark brown inclusions. The specimen measures 37.5 mm long (broken), 22.4 mm wide, and 4.7 mm thick. The additional three specimens are produced on dusky purple, pale yellowish brown, and very light gray quartzite material, respectively (catalog number 29-210-3 (Figure 5.70); and catalog numbers 29-210-4-5 (Figure 5.71)). However, they are significantly thicker than the first specimen, ranging between 8.6 mm and 15.1 mm in thickness.

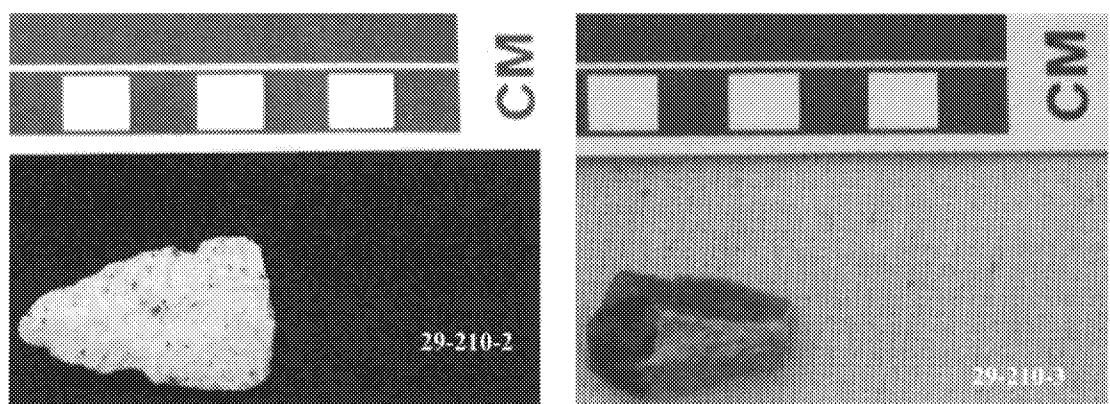


Figure 5.70. View of biface fragments (catalog numbers 29-210-2 and 29-210-3) from northern portion of site 39CU557.

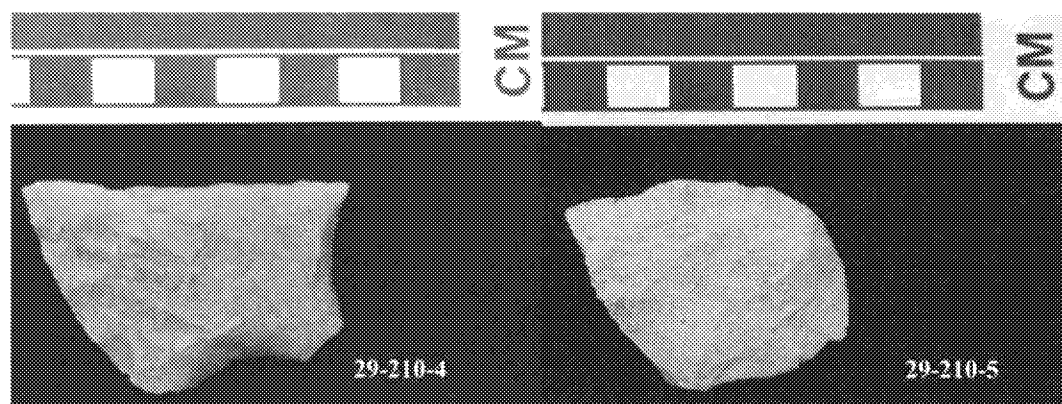


Figure 5.71. View of biface fragments (catalog numbers 29-210-4 and 29-210-5) from northern portion of site 39CU557.

One projectile point fragment (catalog number 29-210-1; Figure 5.72) was collected from the northern portion of the site. This specimen is broken at the approximate mid-point, with the base and lower portions of the blade remaining. The specimen is manufactured from a moderate brown chert that resembles Minnekahta chert native to the Black Hills. The specimen measures 23.1 mm in length (broken), 17.2 mm in width, and 4.1 mm in thickness. The projectile point exhibits excurvate blade margins and a pronounced concave base. The



features exhibited by this specimen mirror those of a point type classified as McKean lanceolate (Frison 1991:94; Kornfeld and Todd 1985; Wheeler 1952). McKean lanceolate points are diagnostic of the Middle Archaic McKean complex (ca. 5,000-3,000 B.P.) found throughout this portion of the Plains.

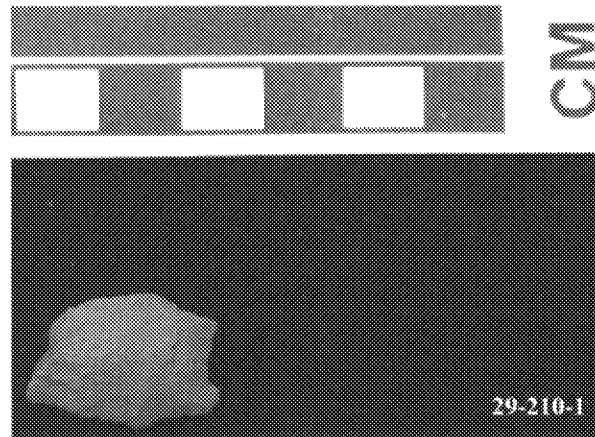


Figure 5.72. Incomplete projectile point specimen (catalog number 29-210-1) from northern portion of site 39CU557.

One biface fragment (catalog number 29-212-7; Figure 5.73) was collected from the southern portion of the site. The specimen is a thick, ovoid form fragment manufactured from grayish red-purple chert. The specimen measures 39.5 mm in length (broken), 27.5 mm in width, and 9.7 mm in thickness.

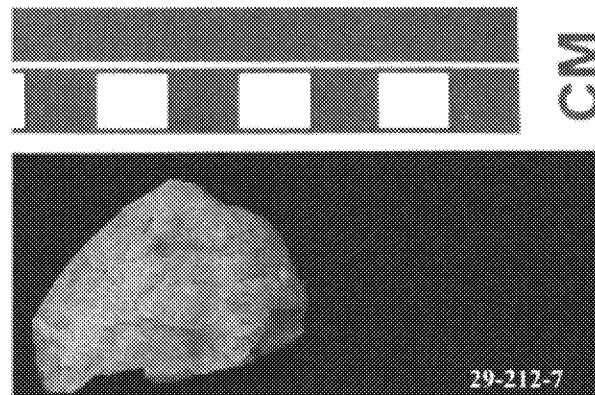


Figure 5.73. Incomplete biface specimen (catalog number 29-212-7) from southern portion of site 39CU557.

One projectile point specimen was collected from the southern portion of the site. The specimen (catalog number 32-288-1; Figure 5.74) is a nearly complete projectile point manufactured from a dusky red chert that also resembles Spearfish formation chert. The





specimen measures 21.5 mm in length, 13.9 mm in width, and 2.8 mm in thickness. The projectile point exhibits a wide, corner-notched design, slightly excurvate blade margins, and a straight base. The features exhibited by this specimen mirror those of a point type classified as Pelican Lake (Frison 1991:104; Wettlaufer 1955). Pelican Lake points are diagnostic of the Late Plains Archaic/Plains Woodland period (ca. 3,000-2,000 B.P.) in the Northern and Central Plains.

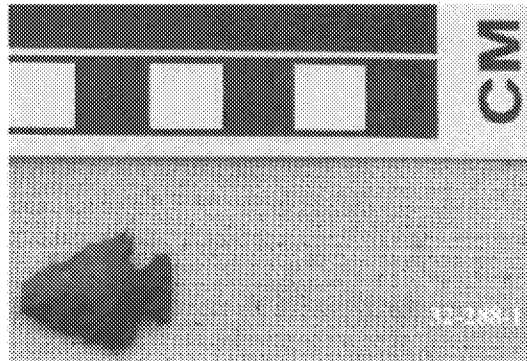


Figure 5.74. Nearly complete projectile point (catalog number 32-288-1) from the southern portion of site 39CU557.

### 5.13.3 Interpretation and Recommendations

Site 39CU557 represents a Native American occupation; however, all remnants of the previously documented hearth features have since been destroyed. Only lithic artifacts were documented by ALAC during the current investigation. The site area was expanded slightly to the east and south during the current investigation.

The NRHP eligibility status of site 39CU557 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). Reher's 1981 recommendation of no further work was predicated on intensive backhoe excavations at the site that failed to yield any intact, buried cultural horizons, additional features, or datable material (Reher 1981:3). Projectile points diagnostic of both the Middle Plains Archaic and Late Plains Archaic/Plains Woodland periods were recovered from the site during the current investigation. However, the absence of intact, buried cultural horizons with deposits suitable for absolute dating precludes any possibility of differentiating the material assemblages associated with the specific historic contexts present. The integrity of the site has been further compromised by erosion as evidenced by the loss of all previously documented hearth features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU557 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC concurs with Reher's original recommendation that this site be considered not eligible for listing on the NRHP. No further work is recommended.



## 5.14 SITE 39CU559

**Site Number:** 39CU559

**Site Name:** N/A

**Site Type:** Artifact Scatter/Hearth

**Cultural Affiliation:** Native American (Late Archaic/Woodland)

**Site Area:** .99 ha

**Landscape Position:** Rolling Plain

**Field Number:** 32-289

**Elevation (in m):** 1,100

**Site Condition:** Disturbed

**Subsurface Testing:** N/A

**Appendix D Map Reference:** D-1

**NRHP Recommendation:** Not Eligible

### 5.14.1 Site Description

Site 39CU559 was originally documented by Charles A. Reher in 1981 during a survey conducted for the TVA in portions of Custer and Fall River counties, South Dakota, and Weston County, Wyoming (Reher 1981). Recorded as a small processing area, the site is documented as an artifact scatter dating to the Late Plains Archaic period (ca. 3,500-1,100 B.P.). It is not clear why a Late Plains Archaic time period was assigned to this site, as the report does not discuss any diagnostic artifact material or radiocarbon dates. The site was not tested at the time, and avoidance was recommended based on high artifact density and the possibility for intact features at the site (Reher 1981:2). No artifact inventory is provided in the report; however, one photographic plate depicts a suite of non-diagnostic lithic tools recovered from the site (Reher 1981:Figure 13-B).

ALAC relocated the site on August 3, 2007. Site 39CU559 was re-examined and documented as a Native American lithic scatter and associated hearth feature situated on an eroded plain at the confluence of Beaver Creek and an unnamed intermittent stream (Figures 5.75 and 5.76). The site boundaries were extended. The expanded site area measures 108 m N-S x 129 m E-W. At the time of the current investigation, the site area was in short grass pasture and scrub brush that afforded good ground surface visibility (60 percent). The majority of the site area is heavily deflated and gullied.

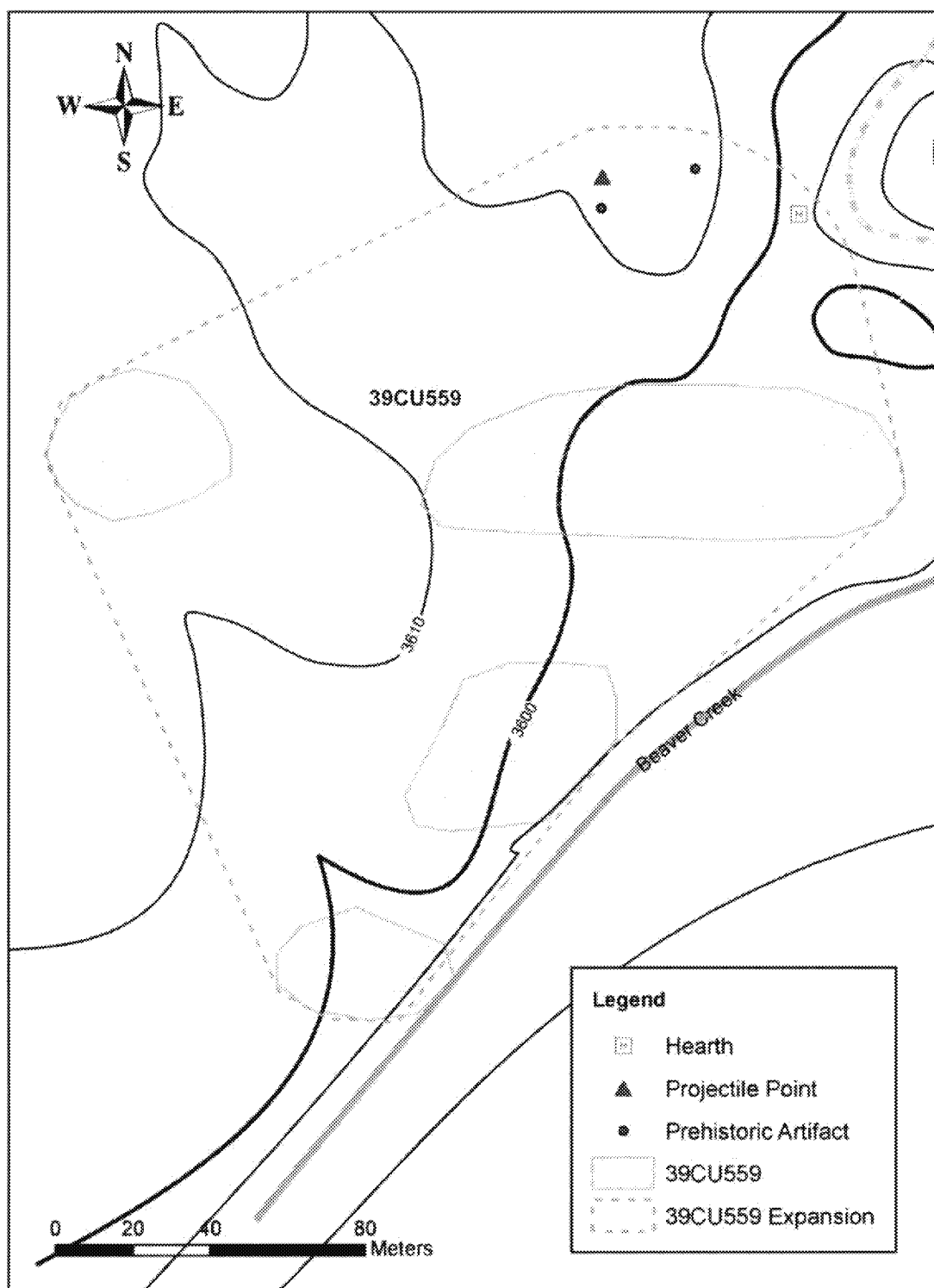


Figure 5.75. Plan view of site 39CU559.

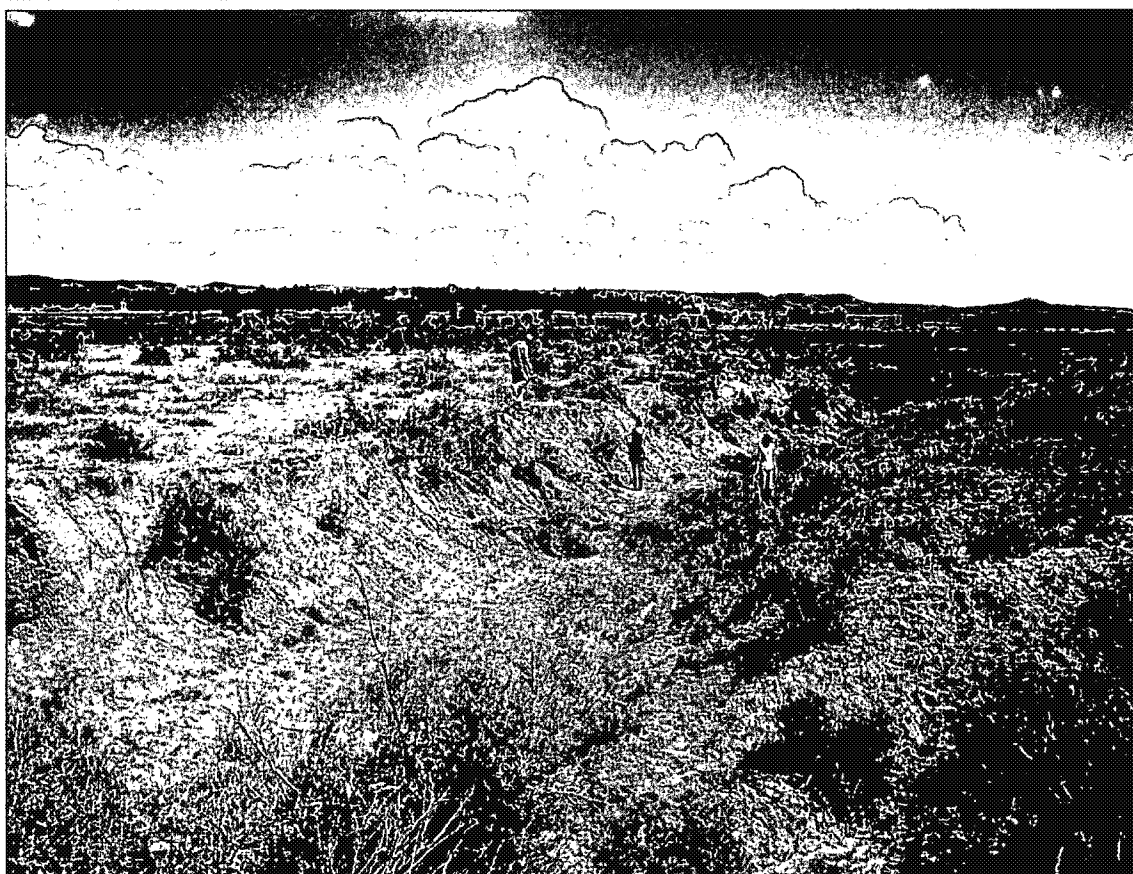


Figure 5.76. Overview of site 39CU559, facing south-southeast.

#### 5.14.2 Artifact and Feature Inventory

Artifact material documented from the site is listed in Table 5.18. One artifact, a projectile point (catalog number 32-289-1), was collected from the site during the current investigation. One hearth feature was also observed at the time of the current investigation. All artifact material and the hearth were documented surficially.

One projectile point specimen (catalog number 32-289-1) was recovered from the site (Figure 5.77). The specimen has had the distal tip removed in a manner consistent with that of an impact fracture. The specimen is manufactured from a grayish red chert that resembles Spearfish formation chert native to the Black Hills. The specimen measures 24.5 mm in length (broken), 18.2 mm in width, and 4.0 mm in thickness. The specimen exhibits a wide, corner-notched design, excursive blade margins, and a concave base. The features exhibited by this specimen mirror those of a point type classified as Pelican Lake (Frison 1991:104; Wettlaufer 1955). Pelican Lake points are diagnostic of the Late Plains Archaic/Plains Woodland period (ca. 3,000-2,000 B.P.) in the Northern and Central Plains.



Table 5.18. Artifacts Observed at Site 39CU559.

Number	Artifact Type	Material	Colors	Comments
1	Tertiary flake	Chert	Purple	
1	Projectile point	Chert	Grayish red	Collected; catalog #32-289-1
1	Shatter	Chert	Red	

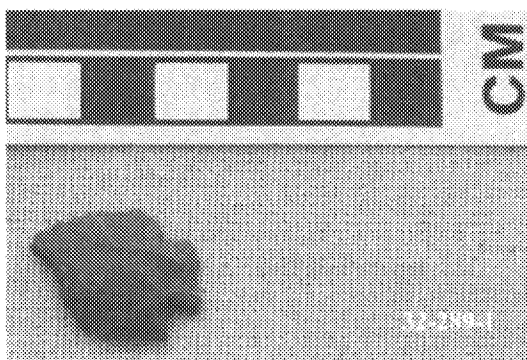


Figure 5.77. Incomplete projectile point specimen (catalog number 32-289-1) from site 39CU559.

One hearth feature (Hearth 1) was observed at the site. The feature consists of hundreds of small limestone, sandstone, and quartzite FCR fragments. No burned earth or charcoal flecks were observed in association with the hearth, and the feature has almost completely eroded away. No photograph is included for Hearth 1 because of the advanced erosion.

### 5.14.3 Interpretation and Recommendations

Site 39CU559 represents a Native American artifact scatter and associated hearth feature. The hearth feature has almost completely eroded away and only three additional lithic artifacts were documented during the current investigation. The four separate areas originally designated as site 39CU559 were combined into one larger site area as a result of the current investigation.

The NRHP eligibility status of site 39CU559 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). Reher's 1981 recommendation of avoidance was predicated on high artifact density and the possibility for intact features at the site (Reher 1981:2). No discussion is included in the Reher report about the landscape of the site area; however, it is assumed that a significant degree of intact soil deposits must have been present at the site when these recommendations were made. Since 1981, the integrity of site 39CU559 has been significantly compromised by wind and sheet wash erosion, such that the majority of the landform on which the site is located has now deflated to gravel and bedrock exposures. Almost no cultural material was documented at the site during the current investigation. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU559 does not satisfy the specifications set forth in Criterion D



of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended at this site.

### **5.15 SITE 39CU648**

**Site Number:** 39CU648  
**Site Name:** N/A  
**Site Type:** Artifact Scatter  
**Cultural Affiliation:** Native American  
**Site Area:** 1.32 ha  
**Landscape Position:** Ridge Top

**Field Number:** 29-165A  
**Elevation (in m):** 1,128  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Not Eligible

#### **5.15.1 Site Description**

Site 39CU648 was originally documented by Kerry Lippincott in 1983 during a survey conducted for the TVA in portions of Custer and Fall River counties, South Dakota (Lippincott 1983). Site 39CU648 was recorded as an artifact scatter/kill site based on the documentation of three bifaces, three flake fragments, and five lower limb elements of a "cow or bison sized animal" (Lippincott 1983:10). No artifacts were collected from the site in 1983, and the report does not specify whether any of the bone fragments exhibited evidence of cultural modification such as cut marks, burn marks, or flaking. Lippincott indicates that the original site area lay atop the crest of a ridge in an extremely eroded locality (Lippincott 1983:10). The NRHP eligibility status of the site was recorded as unevaluated at the time, and avoidance of the site area was recommended (Lippincott 1983:10). ALAC personnel relocated the site on July 16, 2007.

Site 39CU648 was re-examined by ALAC and documented as a Native American artifact scatter situated on a deflated ridge crest approximately 1,300 m northeast of Beaver Creek (Figures 5.78 and 5.79). The site area was expanded to the north approximately 150 m as a result of the current investigation. The dimensions of the expanded site area are 297 m N-S x 235 m E-W. At the time of the current investigation, the site area was in short grass pasture that afforded very good ground surface visibility (70 percent). The landform on which the site is located is exposed and heavily deflated. An aeolian topsoil is present across portions of the site; however, the majority of the area is deflated to gravel exposures. A two-track bisects what is now defined as the southern portion of the site in an east-west orientation. No evidence of faunal remains was identified during the current investigation.



Figure 5.78. Plan view of site 39CU648.



Figure 5.79. Overview of site 39CU648, facing northwest.

### 5.15.2 Artifact and Feature Inventory

Artifacts documented at site 39CU648 are listed in Table 5.19. No artifacts were collected from the site during the current investigation. All cultural material was observed surficially. No features were observed at the site.

Table 5.19. Artifacts Observed at Site 39CU648.

Number	Artifact Type	Material	Colors	Comments
2	Primary flake	Chalcedony	Light gray	
2	Secondary flake	Quartzite	Purple, brown	
5	Secondary flake	Chert	Purple, gray-pink	
2	Tertiary flake	Chalcedony	Light gray	
1	Tertiary flake	Chert	Yellowish brown	
1	End scraper	Tongue River silicified sediment	Pink-gray	
1	End scraper	Chert	Purple	
1	Biface blade	Chert	Purple	





### 5.15.3 Interpretation and Recommendations

Site 39CU648 represents a Native American artifact scatter. The position of the site on an exposed landform leaves it continually subjected to wind and water erosion, and this has resulted in deflation of the site area to numerous gravel exposures. The position of the site atop a gently sloping ridge on an expansive plain is not consistent with other regional kill site localities, which are typically documented at the base of steep-sided cliffs, arroyos, or gullies (cf. Vore (Reher and Frison 1980); Glenrock (Frison 1970); Big Goose Creek (Frison et al. 1978); Piney Creek (Frison 1967); and Wardell (Frison 1973)). The consistent use of this landscape as cattle pasture lends more credence to the assumption that the unidentified bovid remains documented in 1983 belonged to a domestic cow rather than a bison.

The NRHP eligibility status of site 39CU648 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The integrity of the site has been compromised by sheet wash and wind erosion. The deflated nature of the landform on which the site is located indicates no potential for buried, intact cultural material or features in this portion of the APE. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU648 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.

### 5.16 SITE 39CU2000

**Site Number:** 39CU2000  
**Site Name:** Burlington Northern Railroad  
**Site Type:** Railroad  
**Cultural Affiliation:** Euroamerican  
**Site Area:** 10.42 ha  
**Landscape Position:** Rolling Plain

**Field Number:** N/A  
**Elevation (in m):** 1,120  
**Site Condition:** Extant  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Eligible

#### 5.16.1 Site Description

Two separate segments of the Burlington Northern Railroad (BN) were documented within the APE during the current investigation. Site 39CU2000 represents the extant and actively utilized segment of the BN line documented in the Custer County portion of the APE in Sections 29, 32, and 33, T6S, R1E (Figures 5.80 and 5.81). This stretch of railway links the communities of Edgemont, South Dakota and Newcastle, Wyoming, and facilitates the trafficking of low-sulfur coal from the mines of Wyoming's Powder River Basin. The line exhibits ample evidence of Burlington Northern's rehabilitation efforts from two decades prior, including new concrete ties, new trackage, and additional ballast along the berm.

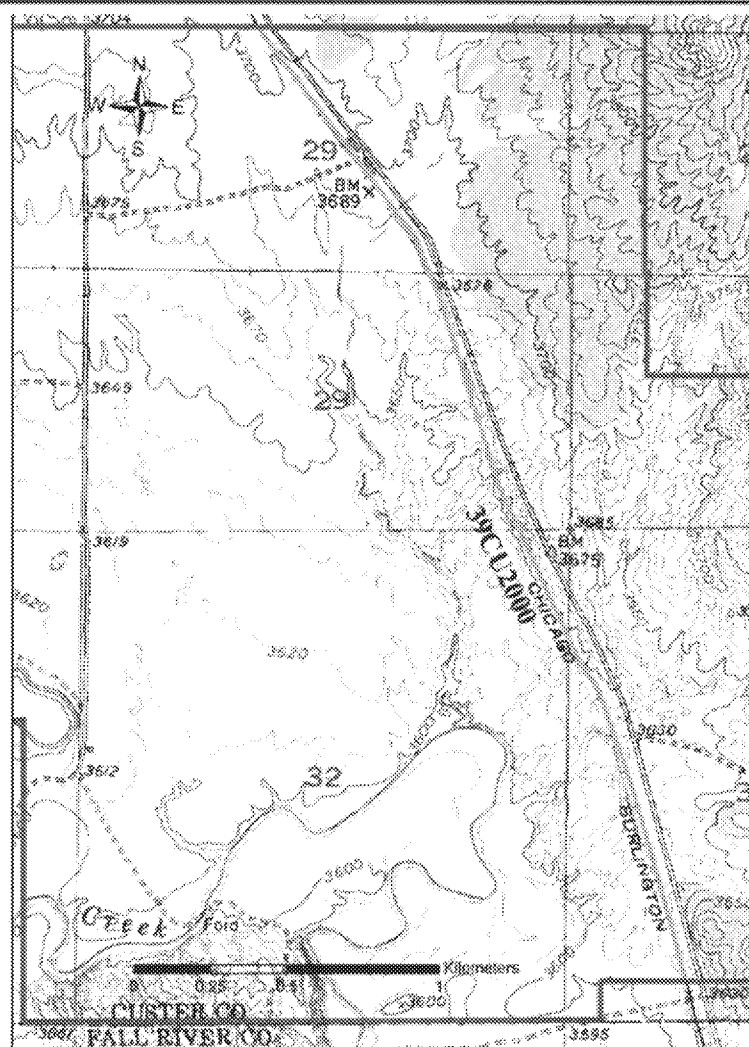


Figure 5.80. Map of site 39CU2000 (USGS 7.5-minute topographic quadrangles Dewey (1951) and Twenty-One Divide (1951)).

### 5.16.2 Historic Background

The Chicago, Burlington & Quincy Railroad (CB&Q), parent to the Grand Island & Wyoming Central Railroad (GI&WC), extended a line north from Alliance, Nebraska into the newly-incorporated state of South Dakota in 1889 (Sundstrom and Sundstrom 1996a:5c-9). This line, which includes the segment of site 39CU2000 in question, represents a branch of the GI&WC's original route between Alliance and Sheridan, Wyoming, and linked the communities of Edgemont and Newcastle. The spur was constructed for the purpose of trafficking coal from the Cambria mine north of Newcastle (Sundstrom and Sundstrom 1996a:5c-9). The GI&WC was eventually absorbed by its parent company which, in turn, merged with the Great Northern Railroad, Northern Pacific Railroad, and the Spokane, Portland & Seattle Railroad in 1970 to form the BN Railroad (Fielder 1964).



Figure 5.81. Overview of site 39CU2000 as seen passing through Section 33, facing east-northeast.

### 5.16.3 Interpretation and Recommendations

In South Dakota, all railroads are considered eligible for listing on the NRHP by satisfying the specifications set forth under Criteria A (significance in association with the overall history of the region) and C (significance as a representation of the transportation, technology, and engineering of the time period) of the NRHP (Hufstetler and Bedeau 1998:44; NPS 1991:37; SHPC 1991:1). However, the Dewey-Burdock Uranium Project, as currently proposed, will not adversely impact any portion of the segment of site 39CU2000 located within the APE. No further work is recommended for this site.



## **5.17 SITE 39CU3561**

**Site Number:** 39CU3561  
**Site Name:** N/A  
**Site Type:** Isolated Find  
**Cultural Affiliation:** Native American  
**Site Area:** .001 ha  
**Landscape Position:** Rolling Plain

**Field Number:** 27-150  
**Elevation (in m):** 1,130  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Not Eligible

### **5.17.1 Site Description**

Site 39CU3561 is a Native American isolated find situated on a narrow, T-1 terrace with a thin, deflated aeolian soil. The site overlooks an intermittent drainage to the north (Figures 5.82 and 5.83). The site area measures 1 m N-S x 1 m E-W. At the time of the current investigation, the site area was in short grass pasture that afforded average ground surface visibility (45 percent).

### **5.17.2 Artifact and Feature Inventory**

A single tertiary flake produced on a yellowish brown quartzite was observed. No features or additional artifacts were observed at the time of the current investigation.

### **5.17.3 Interpretation and Recommendations**

Site 39CU3561 represents a Native American isolated find. The position of the site on an exposed landform leaves it continually subjected to wind and water erosion. This has resulted in deflation of the site area to numerous gravel exposures.

The NRHP eligibility status of site 39CU3561 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The integrity of the site has been compromised by sheet wash erosion. The deflated nature of the landform on which the site is located indicates a low potential for buried, intact cultural material or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU3561 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.

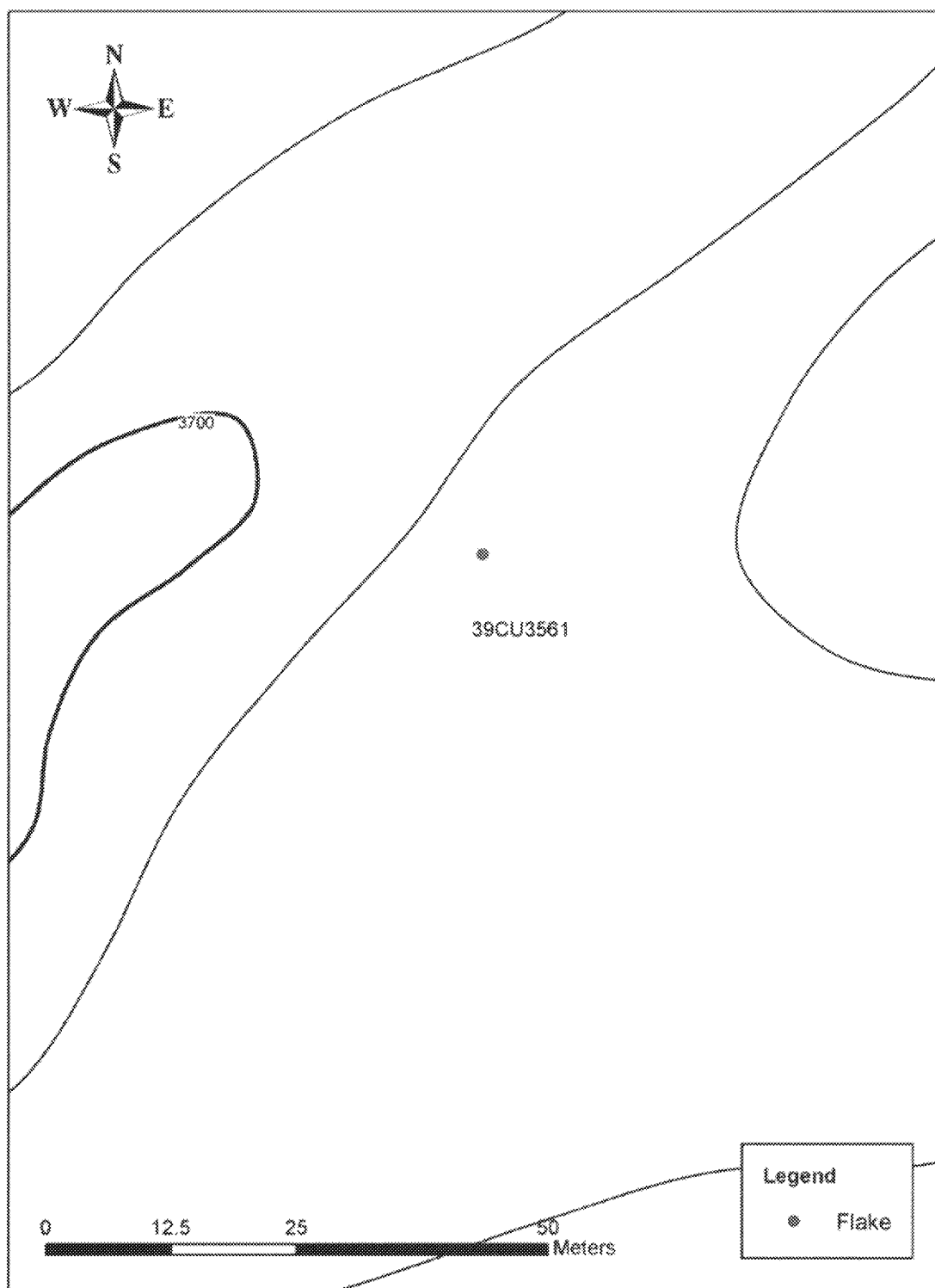


Figure 5.82. Plan view of site 39CU3561.



Figure 5.83. Overview of site 39CU3561, facing east.

## 5.18 SITE 39CU3562

**Site Number:** 39CU3562  
**Site Name:** N/A  
**Site Type:** Artifact Scatter  
**Cultural Affiliation:** Native American  
**Site Area:** .66 ha  
**Landscape Position:** Rolling Plain

**Field Number:** 27-152  
**Elevation (in m):** 1,139  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Not Eligible

### 5.18.1 Site Description

Site 39CU3562 is a Native American artifact scatter situated on a sloping finger ridge approximately 50 m south-southeast of an intermittent drainage (Figures 5.84 and 5.85). The site area measures approximately 83 m N-S x 110 m E-W. The site extends west-southwest down the slope to a point where the ridge levels-out. At the time of the current investigation, the site area was in short grass pasture and scrubland that afforded good ground surface visibility (60 percent). The landform on which the site is located is exposed and heavily deflated. A two-track passes approximately 15 m east of the site in a northwest-southeast orientation.

### 5.18.2 Artifact and Feature Inventory

The artifacts documented at site 39CU3562 are listed in Table 5.20. No artifacts were collected from this site during the current investigation and no features were identified.

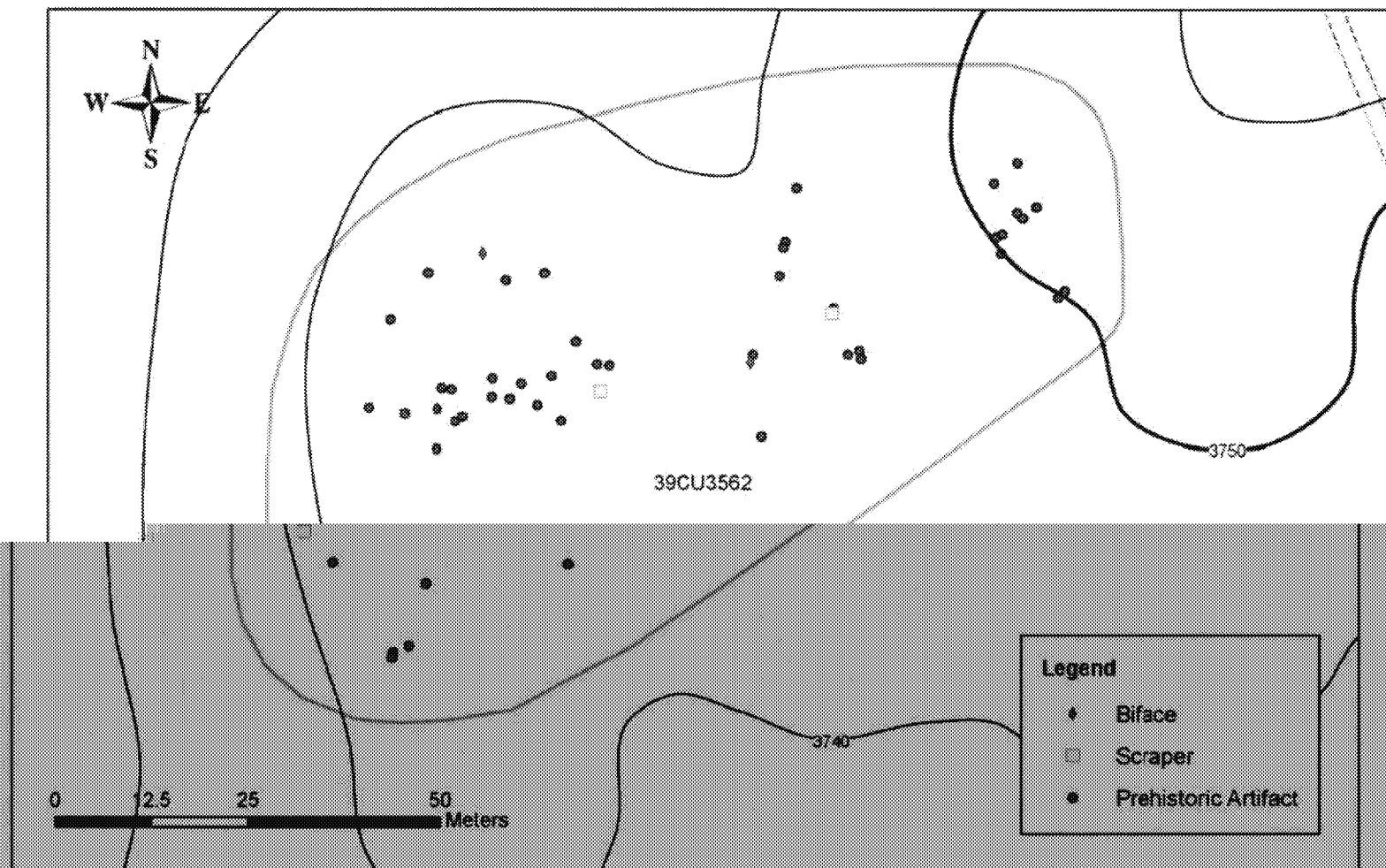


Figure 5.84. Plan view of site 39CU3562.



Figure 5.85. Overview of site 39CU3562, facing south-southwest.

Table 5.20. Artifacts Observed at Site 39CU3562.

Number	Artifact Type	Material	Colors	Comments
2	Primary flake	Chert	Purple	
2	Primary flake	Chalcedony	Brown, light gray	
3	Secondary flake	Chert	Purple	
2	Secondary flake	Chalcedony	Light gray	
2	Secondary flake	Quartzite	Gray, dark red	
8	Tertiary flake	Quartzite	Gray-purple, brown, yellowish brown	One retouched
22	Tertiary flake	Chert	White, gray-tan, purple, red-gray, brown-gray	Two retouched
9	Tertiary flake	Chalcedony	Light gray, brown-gray	
2	Tertiary flake fragment	Chalcedony	Brown	Refit
20+	Finishing/reduction flake	Chert	Purple	
2	Transverse scraper	Chert	Purple, red-gray	
1	Side scraper	Chert	Gray	
1	Biface	Chert	Purple	
1	Biface fragment	Quartzite	Purple	
3	Core	Chalcedony	Light gray	Expended
1	Core	Quartzite	Gray	Expended
1	Shatter	Chert	Purple	





### 5.18.3 Interpretation and Recommendations

Site 39CU3562 represents a Native American artifact scatter. The position of the site on an exposed landform leaves it continually subjected to wind and water erosion. This has resulted in deflation of the site area to numerous gravel exposures.

The NRHP eligibility status of site 39CU3562 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The integrity of the site has been compromised by sheet wash erosion. The deflated nature of the landform on which the site is located indicates a low potential for buried, intact cultural material or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU3562 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.

### 5.19 SITE 39CU3563

**Site Number:** 39CU3563

**Site Name:** N/A

**Site Type:** Artifact Scatter

**Cultural Affiliation:** Native American

**Site Area:** .24 ha

**Landscape Position:** Hill Top

**Field Number:** 27-153

**Elevation (in m):** 1,139

**Site Condition:** Disturbed

**Subsurface Testing:** N/A

**Appendix D Map Reference:** D-1

**NRHP Recommendation:** Not Eligible

#### 5.19.1 Site Description

Site 39CU3563 is a Native American artifact scatter situated on a hill top immediately south of an intermittent drainage (Figures 5.86 and 5.87). The site area measures approximately 56 m N-S x 53 m E-W. At the time of the current investigation, the site area was in pasture dominated by scrubland that afforded excellent ground surface visibility (100 percent). The landform on which the site is located is exposed and heavily deflated. There is no developed topsoil within the site area; only the gravel substrate remains.

#### 5.19.2 Artifact and Feature Inventory

The artifacts documented at site 39CU3563 are listed in Table 5.21. No artifacts were collected from this site during the current investigation.

Table 5.21. Artifacts Observed at Site 39CU3563.

Number	Artifact Type	Material	Colors	Comments
2	Primary flake	Quartzite	Light gray, brown	
1	Primary flake	Chert	Purple	Retouched
1	Primary flake	Chalcedony	Gray	Retouched
1	Tertiary flake	Chert	Light gray	
1	Uniface	Quartzite	Medium gray	
1	Transverse scraper	Quartzite	Brown	
2	Shatter	Chalcedony	Gray, tan-gray	

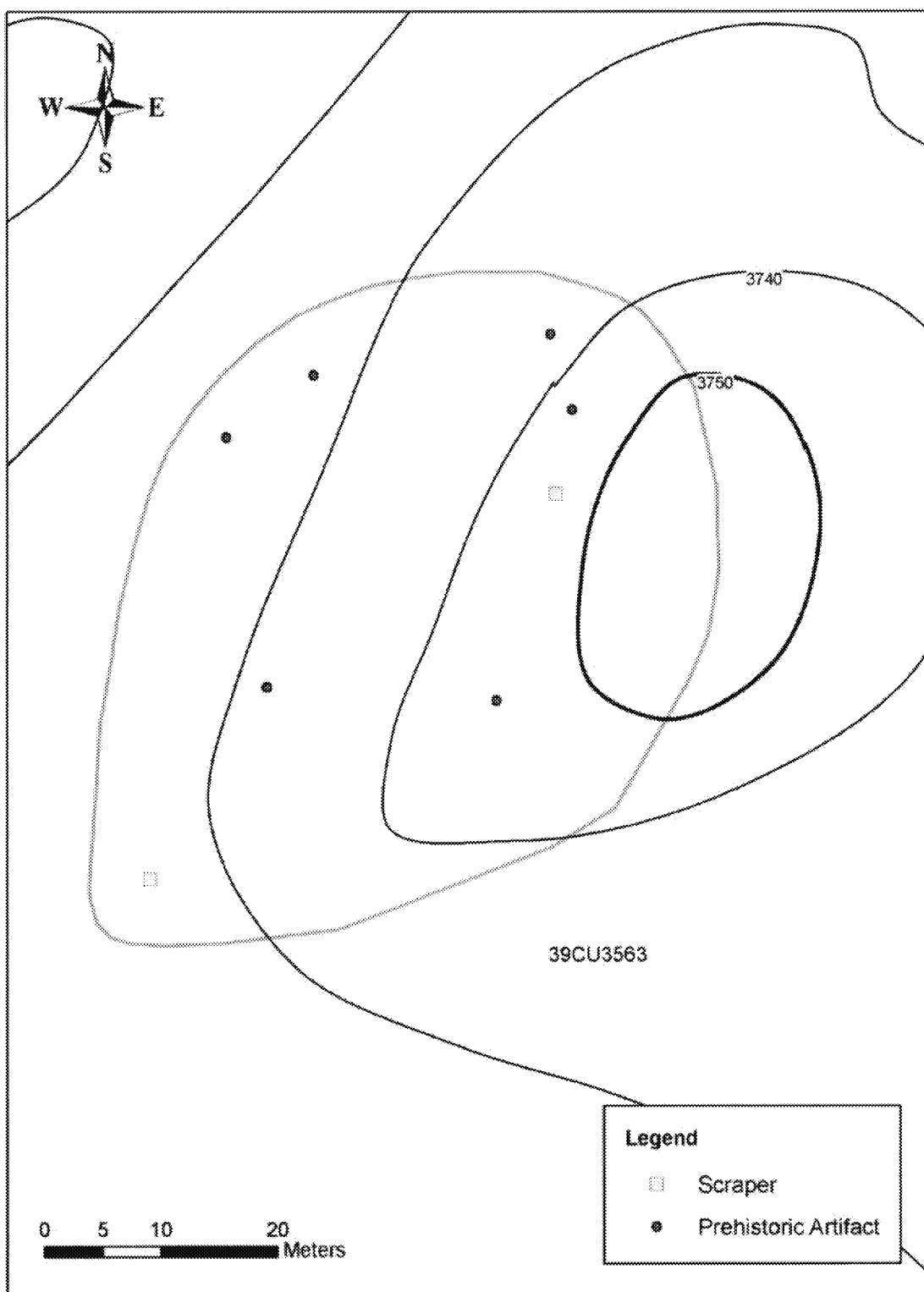


Figure 5.86. Plan view of site 39CU3563.

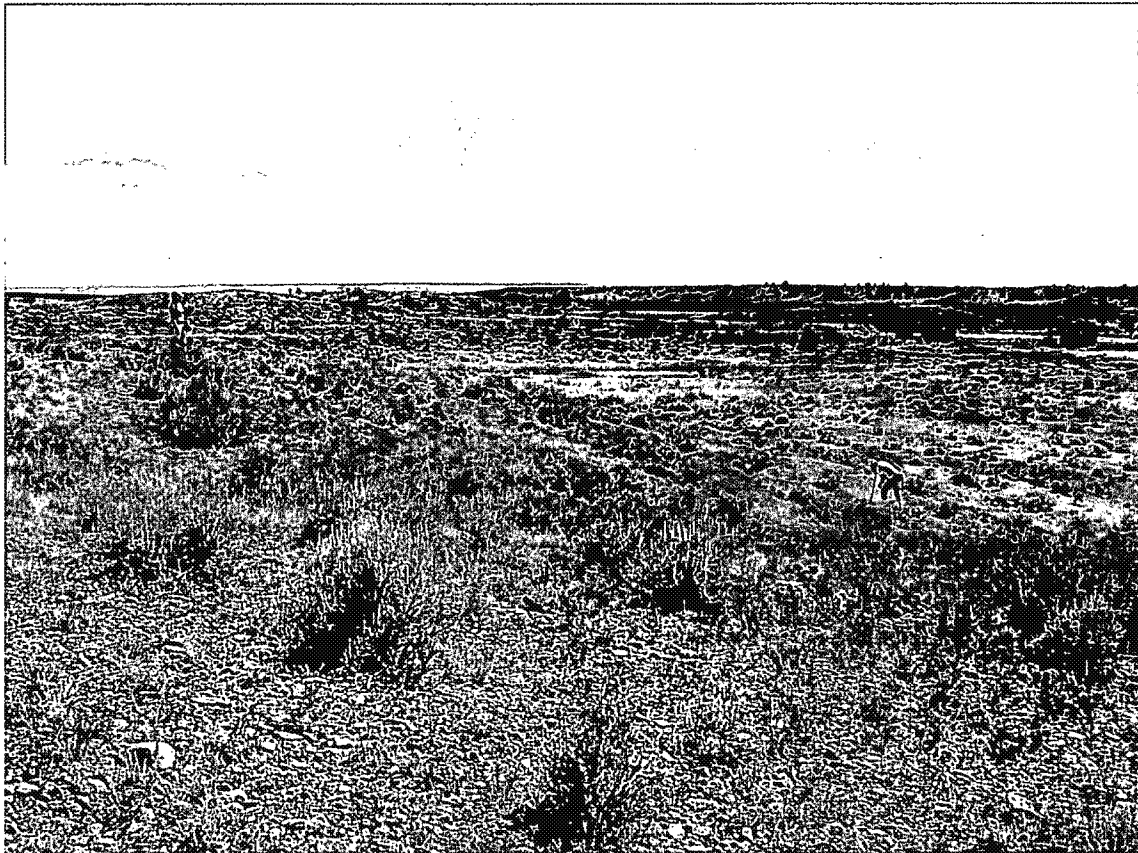


Figure 5.87. Overview of site 39CU3563, facing south-southwest.

### 5.19.3 Interpretation and Recommendations

Site 39CU3563 represents a Native American artifact scatter. The position of the site on an exposed landform leaves it continually subjected to wind and water erosion. This has resulted in deflation of the site area to gravel substrate.

The NRHP eligibility status of site 39CU3563 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The site lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The integrity of the site has been compromised by sheet wash erosion. The deflated nature of the landform on which the site is located indicates a low potential for buried, intact cultural material or features. This suggests that the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. Site 39CU3563 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this site be considered not eligible for listing on the NRHP. No further work is recommended.



## 5.20 SITE 39CU3564

**Site Number:** 39CU3564

**Site Name:** N/A

**Site Type:** Quarry, Cairn

**Cultural Affiliation:** Native American

**Site Area:** 1.19 ha

**Landscape Position:** Hill Top

**Field Number:** 28-214

**Elevation (in m):** 1,133

**Site Condition:** Disturbed

**Subsurface Testing:** N/A

**Appendix D Map Reference:** D-1

**NRHP Recommendation:** Unevaluated

### 5.20.1 Site Description

Site 39CU3564 consists of a Native American lithic procurement site and a rock cairn situated along a narrow finger ridge approximately 276 m west of the right bank of an unnamed intermittent stream (Figures 5.88 and 5.89). The site area measures approximately 285 m N-S x 141 m E-W. The site area has been almost entirely deflated to the gravel substrate. At the time of the current investigation, the site area was sparsely covered in short grass prairie interspersed with prickly pear cacti and sagebrush. The thin vegetation afforded average ground surface visibility (50 percent).

The entire site area is littered with unmodified cobbles and pebbles of the same lithic material types observed in the documented artifact assemblage. No cultural features or material indicative of permanent, semi-permanent, or temporary encampment (e.g., hearths, lodge depressions, ceramics, food processing tools such as manos or metates) were observed at this site.



Figure 5.88. Overview of site 39CU3564, facing northwest.

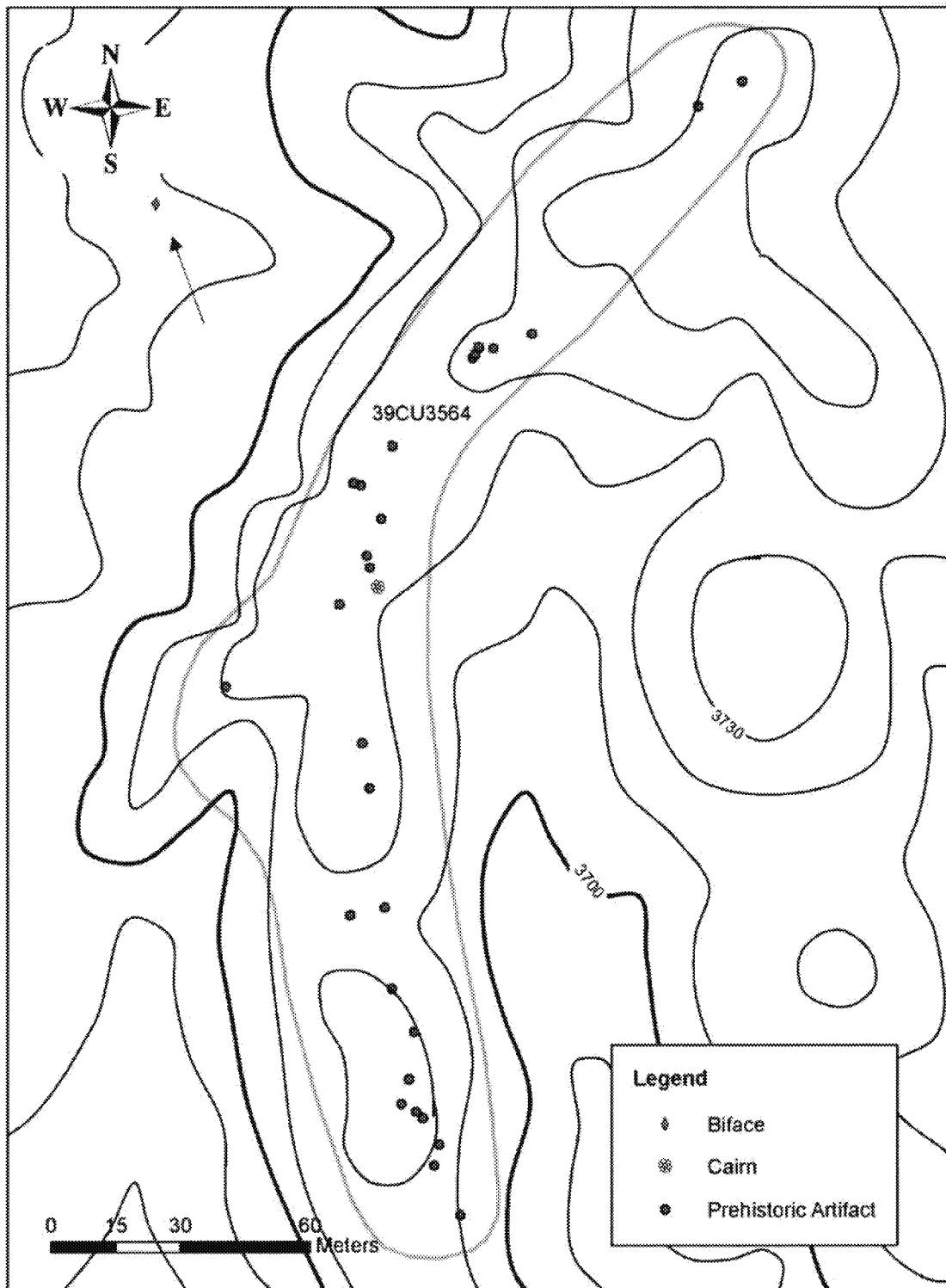


Figure 5.89. Plan view of site 39CU3564.



### 5.20.2 Artifact and Feature Inventory

All artifacts and features comprising site 39CU3564 were observed surficially. The artifacts observed at the site are listed in Table 5.22. No artifacts were collected from the site during the current investigation.

Table 5.22. Artifacts Observed at Site 39CU3564.

Number	Artifact Type	Material	Colors	Comments
4	Primary flake	Chert	Pink, light purple, light gray	
2	Primary flake	Quartzite	Purple, gray-purple	One utilized
1	Primary flake	Chalcedony	Light gray	
3	Secondary flake	Chert	Purple	
3	Tertiary flake	Chalcedony	Gray, white, light gray	
2	Tertiary flake	Chert	Brown-gray, purple	
1	Flake	Quartzite	Purple	Retouched
1	Biface	Chert	Dark red	Located immediately northwest of the main site area downslope in a gully (indicated by arrow on Figure 5.89).
1	Core	Quartzite	Purple	Expendable
1	Core	Chalcedony	Gray	
1	Core	Chert	Dark red	Expendable
3	Tested pebble	Chert	Light purple, dark red, red	One utilized
1	Tested cobble	Chalcedony	Gray	
1	Shatter	Chalcedony	Light gray	

One cairn feature was observed at the site (Figure 5.90). The cairn is roughly circular in shape, measuring approximately 1 m in diameter. It consists of 12, locally derived cobbles of granitic composition, and appears largely intact.

### 5.20.3 Interpretation and Recommendations

The abundance of analogous types of lithic material in both culturally-modified and unmodified forms at this site suggests that it was used primarily for the procurement of lithic resources. This supposition is further corroborated by the paucity of artifact material, as well as cultural and natural features that would typically indicate permanent, semi-permanent, or temporary settlements or encampments. An example of such indicators includes, but is not limited to, the following: fresh water in the immediate site area, hearths, lodge depressions/tipi rings, ceramics, food processing tools such as manos or metates, and cache pits.

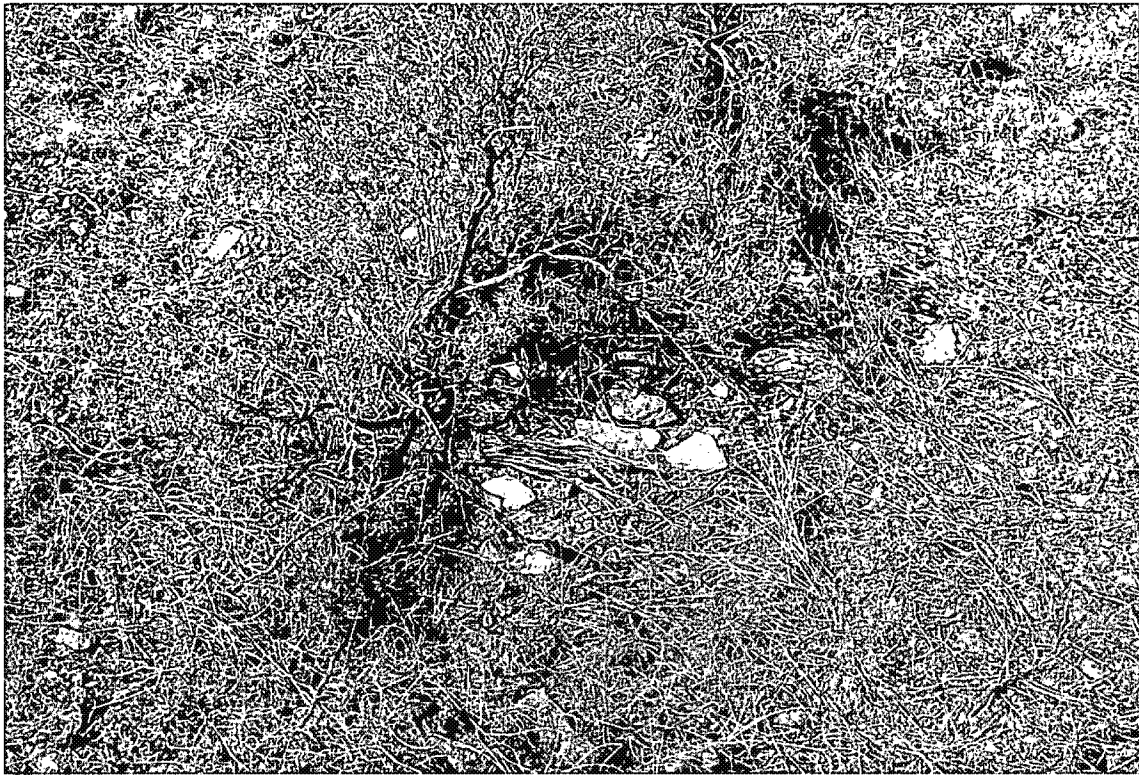


Figure 5.90. View of cairn feature, site 39CU3564, facing north.

The cairn feature remains unevaluated at this juncture. Historic and ethnographic documentation of aboriginal cairns in the Black Hills indicates that these monuments served various roles, including: resource area markers, landmarks, trail markers, camp markers, burial markers, cache markers, ceremonial/spiritual area markers (Wolf 1996:3f-25), and drive line components (Brink and Rollans 1990:153). A number of cairns have been previously documented in association with lithic reduction and quarry sites in the Black Hills, and Wolf (1996:3f-26) suggests that these features may have been utilized for marking such resources on the landscape. The cairn at site 39CU3564 is not large enough in diameter to accommodate the mortuary remains of an adult human. Only the remains of an infant or very small juvenile could have been placed beneath the feature.

It should be noted that the construction of such features is not a hallmark solely indicative of aboriginal inhabitants. Modern-day hikers have been known to construct cairns as trail markers, and Frison (1991:363) cites research documenting current sheepherders who constructed a multitude of stone features, such as cairns and walls, simply as a means of passing time. Ethnographic evidence recently obtained from Wind Springs Ranch, north of Scottsbluff in western Nebraska, confirms that sheepherders constructed comparable stone features under similar circumstances in this portion of the Plains (David Hushson, Wind Springs Ranch owner, personal communication 2008).

The NRHP eligibility status of site 39CU3564 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or



history (NPS 1991:37). The portion of site 39CU3564 identified as a quarry/lithic procurement area lacks diagnostic or datable materials and cannot be evaluated in a specific historic context. The integrity of the site has been compromised by sheet wash erosion. The deflated nature of the landform on which the site is located indicates a low potential for buried, intact cultural material or features. This suggests that the quarry/lithic procurement component of the site does not possess the potential to yield datasets capable of addressing specific research questions that would further our collective understanding of prehistoric cultures in the area. The quarry/lithic procurement component of site 39CU3564 does not satisfy the specifications set forth in Criterion D of the NRHP (NPS 1991:37). ALAC recommends that this component be considered a non-contributing element to the site. The NRHP eligibility status of the cairn feature could not be definitively ascertained within the scope of the current investigation. It appears likely that the primary function of this feature was the identification of the associated lithic resource material. However, it is possible that this feature served some other function (e.g., burial) ALAC recommends that this site be considered unevaluated in terms of its eligibility status for listing on the NRHP. Evaluative testing of the cairn feature is recommended.

## 5.21 SITE 39CU3565

**Site Number:** 39CU3565  
**Site Name:** N/A  
**Site Type:** Artifact Scatter  
**Cultural Affiliation:** Native American  
**Site Area:** .35 ha  
**Landscape Position:** Valley Floor

**Field Number:** 28-216  
**Elevation (in m):** 1,120  
**Site Condition:** Disturbed  
**Subsurface Testing:** N/A  
**Appendix D Map Reference:** D-1  
**NRHP Recommendation:** Unevaluated

### 5.21.1 Site Description

Site 39CU3565 is a Native American artifact scatter situated along a drainage bottom in a V-shaped valley (Figures 5.91 and 5.92). The site area measures 85 m N-S x 65 m E-W. At the time of the current investigation, the site area was in short prairie grass pasture interspersed with prickly pear cacti and sagebrush. The vegetation afforded average ground surface visibility (50 percent). The documented artifact assemblage consists solely of lithic material.

### 5.21.2 Artifact and Feature Inventory

The artifacts documented at site 39CU3565 are listed in Table 5.23. All of the artifacts from this site were documented surficially. No features were identified.

Table 5.23. Artifacts Observed at Site 39CU3565.

Number	Artifact Type	Material	Colors	Comments
1	Secondary flake	Chert	Light brown	
3	Tertiary flake	Chalcedony	White, light gray	
1	Tertiary flake	Chert	Light purple	
1	Shatter	Chert	Brown/gray	
1	End/side scraper	Hartville Uplift chert	Mahogany	Collected; catalog no. 28-216-1



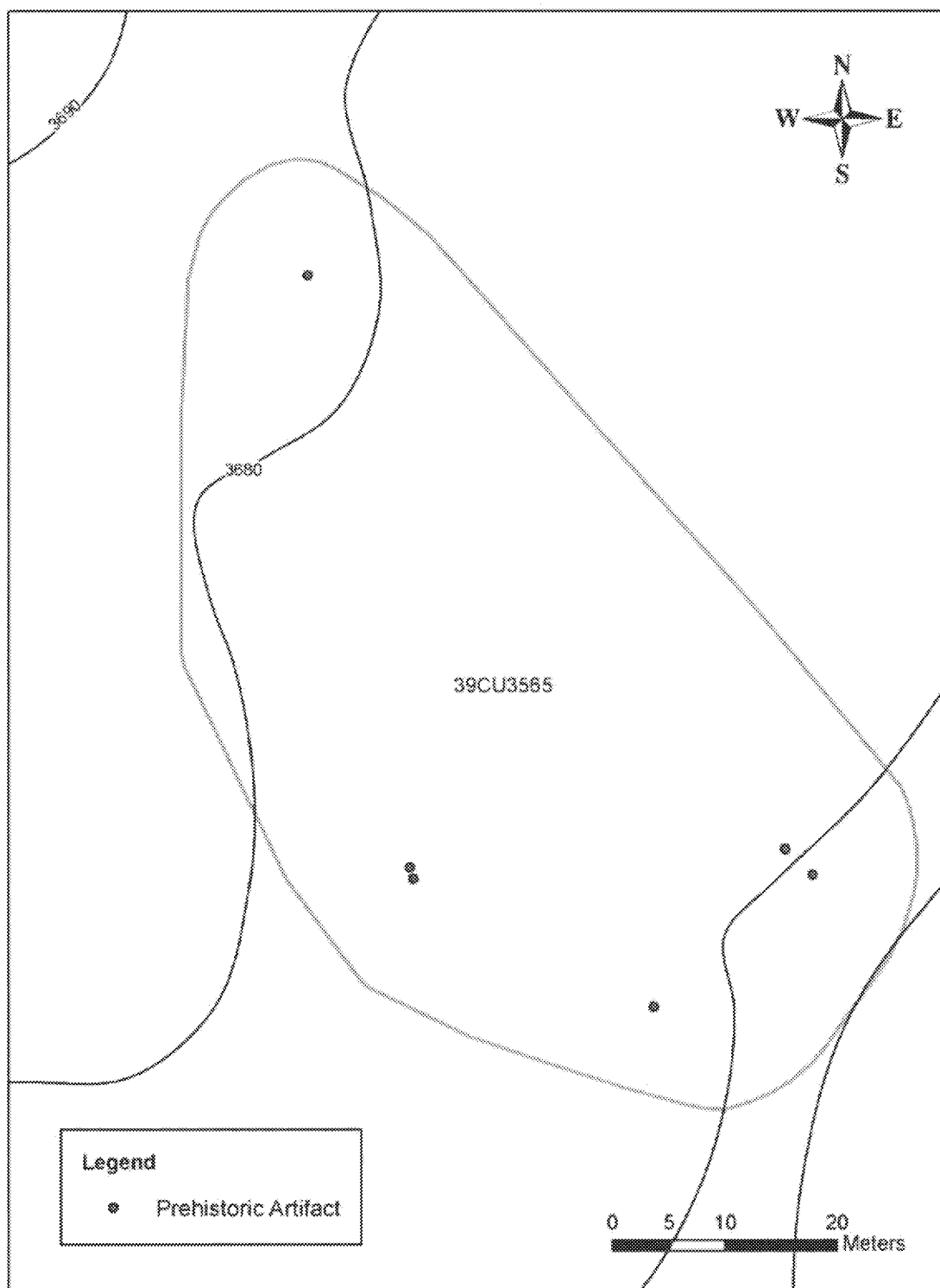


Figure 5.91. Plan view of site 39CU3565.



Figure 5.92. Overview of site 39CU3565, facing south.

One complete scraper (catalog number 28-216-1) was collected from the site (Figure 5.93). The specimen is ovoid in shape, and although primarily utilized as an end scraper, also possesses a significant amount of retouch along one lateral margin. The specimen was manufactured from Hartville Uplift chert. It measures 54.6 mm in length, 35.7 mm in width, and 18.65 mm in thickness.

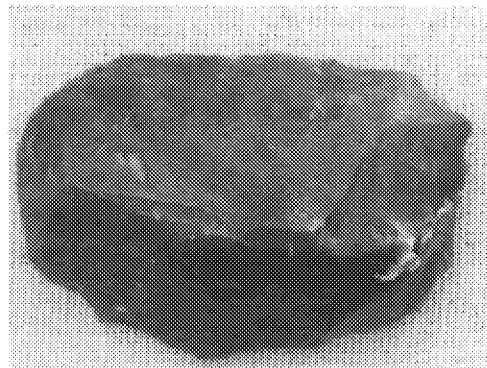


Figure 5.93. Complete scraper collected from site 39CU3565 (catalog number 28-216-1).

### 5.21.3 Interpretation and Recommendations

Site 39CU3565 represents a Native American artifact scatter. Although the site has been subjected to wind and water erosion, it does not appear completely deflated.

The NRHP eligibility status of site 39CU3565 is considered under Criterion D of the NRHP, that is, having yielded, or having the potential to yield, information important in prehistory or history (NPS 1991:37). The NRHP eligibility status of site 39CU3565 could not be definitively ascertained within the scope of the current investigation. ALAC recommends additional evaluation of this site.